

April 1998  
Vol 5 No 4

Phoenix  
OS/2  
Society

# extended attributes

The magazine of the OS/2 community

\$2.95 US (\$3.50 Canada)





# Indelible Blue — Outfitters For The Information Frontier



When setting out on an expedition, pioneers and explorers relied on their outfitters for trustworthy gear and advice. As your business advances, you need an outfitter for your technology needs. Computer gear — software or hardware — needs to be dependable, always providing the right solutions for the right need. Indelible Blue helps you chart the best path through the rocky terrain of computer technology.

- Hard-to-find Tools and Utilities
- Custom software operating system preloads
- IBM and Lotus software specialists
- Expert volume license administration

## Smartsuite For OS/2 Available Now!

It's here, it's hot and Indelible Blue has it!  
Order today



1. \$10 discount to everyone who purchased a beta copy (proof of purchase required).
2. Everyone who orders is eligible for a prize drawing. See our Website for details.



**800-776-8284**  
**www.indelible-blue.com**





## Features



A web captures the morning dew and our imaginations.

Cover concept and artwork by Bill Schindler.

### 4 What are extended attributes anyway?

Besides the magazine that is. What happens when EAs become corrupt?

### 19 Tripping the light (tables) fantastic

OS/2 has more multimedia features than you may know about.

## Departments

### 2 Wombats and Warp

Warp ads? Wombats? Bill ponders the puzzling

### 3 Developing answers

Esther visited another developer's conference and contrasted their attitudes with IBM.

### 5 Making my net work

Judy explains the steps she took to get her home network set up.

### 18 Showing your character

Marilyn becomes a font of wisdom.

## Software

### Internet tools

This month, *ea* focuses on applications and utilities to enhance your use of the Internet.



### 8 ProNews/2 Newsreader

### 10 Internet Adventurer

### 23 HTML Studio

### 27 InJoy

### 12 PowerQuest's new Drive Image

A new version of this popular utility is released.

### 16 Your wish is my command line: 4DOS and 4OS2

JP Software's popular utilities promise to improve the command line. How well do they deliver.

### 21 DeskMan/2

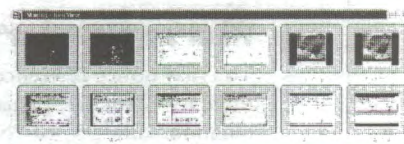
Serious desktop management. Craig takes a serious look.

### 25 New and improved

Announcements of OS/2 software new on the market.

### 28 BackTalk

A free text to speech engine? How good could it possibly be? Julian found out.



## Society news

### 13 It's in the email: Southsoft at general meeting

Learn about the popular PMMail and PMINews at the next meeting.

### 14 Coming events, meeting locations, and membership

Scheduled meetings and events, maps, directions, and the membership application.

### 15 SIG news

Find out what's happening at the special interest groups

## extended attributes

*extended attributes* is the award winning monthly magazine of the Phoenix OS/2 Society, Inc.

This issue of *extended attributes* was produced using OS/2, DeScribe 5.0, Lotus Word Pro, FrameMaker 5.1.1, Enhanced Editor 6.03, TrueSpectra Photo>Graphics, and Impos/2. Camera ready images were printed on an IBM Lexmark 4039 10R laser printer

at 600 dpi. Printing was done by Adcraft Printing, Inc, Phoenix, AZ.

Deadline for article submissions is the 5th of the month prior to issue. Send articles to [editor@possi.org](mailto:editor@possi.org) or the Society's mailing address. Email reviews to Craig Greenwood ([reviews@possi.org](mailto:reviews@possi.org)). Email SIG news to Ernie Fisch (see next page).

For change of address, send an email to [editor@possi.org](mailto:editor@possi.org) or mail the form in the center of the magazine to the Phoenix OS/2 Society, Inc. *extended attributes* is mailed at bulk rate—the US Post Office will not forward!

Approximate circulation of this issue: 650.

Copyright © 1998 by the Phoenix OS/2 Society, Inc.

# comment Wombats and Warp

by Bill Schindler, Editor-in-chief

Events have conspired so that this issue of *extended attributes* actually has the same amount of article content as a 60 page "commercial" magazine.

What happened is that we had some advertisers drop out at the same time that I needed to catch up on an article backlog. Normally, we'd cut the page count to match the loss of advertising. For this one issue, we replaced the lost advertising with articles.

To keep up this amount of content, we'd need a couple more advertisers, a few more writers, and at least two more assistant editors. Volunteers?

## What's a "Wombat"?

You may notice references here and there to "Wombat," usually in combination with "95" or "NT."

Although it's probably obvious that "Wombat" is actually referring to "Windows," you may not know where it came from.

Right after the Society's new discussion list serve came online, a

message thread started on whether it was okay to put humor on the list. Predictably, part of the discussion centered on the political (in)correctness of some types of humor. Someone, I no longer know who, posted a tongue-in-cheek message saying that they were offended by the use of the "W" word; but they felt that since you have the right to use it, they always mentally replace the "W" word with "Wombat."

That started it. It's rare to see anyone use the "W" word on the list anymore. Wombat won out, hands down!

So now "Wombat" is slipping into conversations at meetings, and it's now showing up on the pages of our magazine.

Which, I think, proves that OS/2 users still have a sense of humor.

## OS/2 Warp ads

IBM is advertising OS/2 Warp again. Most of the advertising is in the form of banner ads on a wide variety of sites. But I've heard

rumors of print ads showing up here and there, too.

After all the "transitioning our customers" hoopla from the IBM powers that be, I have to wonder what's going on. Did somebody misappropriate some advertising funds or is this for real?

And to add to the confusion, there's some fresh rumors about Warp 5. Now, I've heard IBM management say that there wouldn't be another OS/2 client version. Yet for the last few months, I've been hearing mutterings about programmers here-and-there around the world working on yet-another Warp 5 feature.

So, are we getting a Warp 5 client or are we getting "transitioned" to something else? And do all those Warp ads mean something or are they just corporate indigestion?

Who knows? (If you do, send me an email at [editor@possi.org](mailto:editor@possi.org).)

Meanwhile, see another reason why you may not need to run Wombat, uh, Windows 95:

[www.os2ss.com/win32-os2/](http://www.os2ss.com/win32-os2/)

## Phoenix OS/2 Society, Inc

The Phoenix OS/2 Society, Inc (POSSI) is an organization of computer users with an interest in IBM's OS/2 operating system.

Phoenix OS/2 Society, Inc.  
5515 N 7th St, Ste 5-133  
Phoenix, AZ 85014-2585  
Voice mail: 602-949-4341  
Web: <http://www.possi.org>

### President

Dick Krueger [president@possi.org](mailto:president@possi.org)

### Vice-president

Lee Baldwin [lbaldwin@primenet.com](mailto:lbaldwin@primenet.com)

### Secretary

Marilyn Pizzo [mpizzo@ibm.net](mailto:mpizzo@ibm.net)

### Treasurer

Stan Hall [srhall@ibm.net](mailto:srhall@ibm.net)

### Program chair

Esther Schindler [esther@bitranch.com](mailto:esther@bitranch.com)

### Board member at large

Sam MacDonald [samemac@ibm.net](mailto:samemac@ibm.net)

### Membership officer

Evelyn Hitch [hitch@ibm.net](mailto:hitch@ibm.net)

## extended attributes

### Editor

Bill Schindler [editor@possi.org](mailto:editor@possi.org)

### Assistant editors

Susan Malling [susan@perfectniche.com](mailto:susan@perfectniche.com)  
Esther Schindler [esther@bitranch.com](mailto:esther@bitranch.com)

### Reviews editor

Craig Greenwood [reviews@possi.org](mailto:reviews@possi.org)

### SIG news editor

Ernie Fisch [ernfisch@indirect.com](mailto:ernfisch@indirect.com)

### Contributing editors

Craig Greenwood [craig@possi.org](mailto:craig@possi.org)  
Marilyn Pizzo [mpizzo@ibm.net](mailto:mpizzo@ibm.net)  
Joel Frey [jomafraz@primenet.com](mailto:jomafraz@primenet.com)  
Esther Schindler [esther@bitranch.com](mailto:esther@bitranch.com)

### Cartoonist

Ron Boe [ronsueboe@sprintmail.com](mailto:ronsueboe@sprintmail.com)

### Advertising manager

Frank Pizzo [fpizzo@ibm.net](mailto:fpizzo@ibm.net)

Advertisers: Contact Frank Pizzo for an advertising rate sheet, insertion order, and



# on the bitstream Developing answers

by Esther Schindler

I love my new job. I have the opportunity to examine technologies different from those I'd grown used to. As the self-labelled OS/2 goddess, I grew to know one topic well; my new job lets me expand my vista, again.

As part of that job, I spent a few hours last week at the BeOS Developer's Conference in San Jose. I won't discuss the technology here, as I'll be writing about it elsewhere. If you're interested in learning about this new "Media OS," head over to [www.be.com](http://www.be.com). Instead, I'll compare Be's developer relations to the IBM attitudes I've seen, over the years.

## ISVs training IBM

Considering the number of OS/2 applications I've reviewed, it's unsurprising that I know hundreds of OS/2 developers. To many of those independent software vendors (ISVs), I became a confidante, as I clearly wanted them (all) to flourish and prosper. So I learned about their marketing successes and their development frustrations. I heard what they thought of their competitors. I found out about their wedding plans. And, in excruciating detail, I heard about their relationships with IBM.

In some ways, it may be unfair to compare the Be conference to IBM. I'm comparing what Be *says* (when they're new on the scene, and enthusiasm is high) to what IBM *does*. For instance, many established OS/2 software vendors have been at it for ten years. They've grown cynical. Even "young" ISVs have outlived the careers of most of the OS/2-related IBM staff. Time and again, I've watched OS/2 ISVs bring IBM personnel up to speed, educating them about the ISV's product line, the customer installed base, and so on—even though the expertise ought to come from IBM, not the other way around.

ISVs know the territory, and they bet their business on OS/2's success. The IBMers in developer relations were in another division last month, and if this position goes sour they can always find another job in the company. IBMers' emo-

tional makeup is diametrically opposed to the entrepreneurial spirit that makes someone say, "Let's get a second mortgage on the house to finance the business."

## Precious commodities

Nonetheless, I was emotionally struck by the difference in attitude at the Be Developer's Conference. Sure, it was small. I'd guess that fewer than 200 developers attended, and the ten-or-so booths in the "exhibit hall" were tiny. As in the OS/2 development community, everyone knew each other.

The real attitude difference came from Be's staff. First, it seemed like everyone from Be attended, and they were anxious to interact with the developers. But more importantly, each developer was treated as if he was *precious*, someone vital to Be. Thinking of the neglect inflicted by IBM towards OS/2 developers over the years, I almost cried.

Frank Boseman, Be's brand-new VP of Developer Relations—he's been on the job for three weeks—put up a slide describing his team's mission. I scribbled too fast to capture the exact wording, but his points included:

- Link developers together
- Provide people to help
- Support developers locally
- Help you get to events and shows
- Assist with (language) translation, distribution, and press relations

The first item on the list almost stunned me. In my observation, at no time has it so much as occurred to IBM to "link developers together"—much less at the top of the list. IBM has acted as if "linking ISVs together" would only result in a lynch mob.

Yet when the technology is young, another developer is apt to have discovered a workaround that the company doesn't know about yet. Be hopes that software developers will gain more by working together than they will by competition, since the major challenge is to get attention and recognition.

Be seems to be putting its money where its mouth is. They're offering to help developers "get to" events and shows like CeBit and Comdex (implying the developer would get free booth space, though I didn't ask), and they'll provide pointers about important upcoming Be applications to the press... er, like me. I suspect Be means what it says, because this small company has at least four people devoted to different segments of the developer community, such as flat-media applications and developer tools. IBM ostensibly had such support, but it was lame unless you were on their "A List" of business partners.

Boseman pointed out, "We know that nobody buys an OS. Customers buy *solutions*, and those solutions are built on top of applications. You're the most important people we know." Never, not once, have I heard an IBM staffer in a position of responsibility express such a viewpoint to an ISV.

## Who does the marketing?

To be fair, I've seen plenty of technical people at IBM provide support (emotional and technical) to OS/2 vendors. On many occasions, I've seen IBM employees apply the Grace Hopper Rule ("It's easier to get forgiveness than permission") to help an OS/2 developer. Yet, in a way, this points to a significant part of the problem we've encountered as OS/2 users. *Why is it the technical staff that's providing the support?*

In most companies, developer support is a marketing function. Look at that bullet list again: they're *business* functions, with some technical liaison. Yet at IBM, the marketing people wanted OS/2 to be as (un)sexy as CICS. It was, and is, the IBM techies who acted as the OS' evangelists—and did most of the real marketing. Technical people have neither the resources nor the know-how to market effectively, just as marketing people don't know how to design a top-quality product. Is it any wonder we've landed in the current situation? ☹

Esther Schindler is program chair of the Phoenix OS/2 Society. In real life, she's Technology Editor for ZD's *Smart Reseller* magazine. You can reach her at [esther@bitranch.com](mailto:esther@bitranch.com).



# What are extended attributes, anyway?

by Doug Yriart

If you use OS/2 for any length of time, especially if you help other OS/2 users and answer questions about the operating system, you will eventually run into questions about the mysterious **EA DATA. SF** file found in the highest level, root directory of some disk drives. This file can be very large, at times reaching several megabytes in size, and it doesn't appear to belong to any application. First, a word of advice:

Do not even think of touching **EA DATA. SF**!

OS/2's extended file attributes—known as extended attributes, or EAs—are stored on a File Allocation Table (FAT) type drive. EAs are an integral part of the OS/2 file system, but were not originally supported on FAT. IBM retrofitted them to FAT by storing them in a pseudo file called **EA DATA. SF**. (Yes, the spaces are really there in the file name. That's to make it harder to delete accidentally.) EAs are an integral part of OS/2's High Performance File System (HPFS), included in the original design. This is why you never see an **EA DATA. SF** file on an HPFS drive.

Some EAs are nice to have, such as the associations between files and applications. Also, file icons and other kinds of information important to particular applications may be installed in EAs. For example, REXX routines are "compiled" the first time you run them. The compiled version is stored in an extended attribute of the program's file.

## When bad things happen to good file systems

Loss of EAs on the boot drive of an OS/2 system can sometimes render it unbootable. This is why it is a bad idea to use DOS utilities, such as disk optimizers, on a FAT drive used by OS/2.

EAs on FAT drives have to be stored in **EA DATA. SF**, instead of in the file system structure itself. As a result, there must be a link between each file's directory entry (when the file has EAs) and the EAs themselves.

The structure of file directory entries in the FAT file system is backward compatible with the directory entry structure of the CP/M operating system, DOS' ancestor. In the FAT directory entry are a series of reserved bytes in an area that CP/M used, but aren't used by DOS. To retrofit EAs to FAT, IBM used two of the reserved bytes in the directory entry as a pointer to the file's **EA DATA. SF** information.

Because DOS does not use the reserved area of the directory entry for any purpose, many DOS disk management utilities ignore it. Utilities such as disk optimizers move files around and reorganize directory entries. When directory entries are copied, the utilities often do not copy the reserved area. This causes the file to lose its link to its EAs. On the other hand, some DOS disk management utilities are "EA safe." Before you use a DOS disk management on a FAT drive used by OS/2, find out if the utility is EA aware. If you have any doubts, don't use the utility. A number of OS/2 disk management utilities can do the job for you, without damaging the EAs on a FAT drive.

To confuse matters, Windows 95 uses those same two reserved bytes for a different purpose. Sharing a FAT drive between OS/2 and Windows 95 will put OS/2's EAs at risk. If only data is stored on the shared drive, you may experience some annoyance, such as a loss of associations between applications and their files, but the data will be safe. Sharing a FAT drive with OS/2 applications and Windows 95 is much more risky; some applications will not work properly if the EAs to key files are lost or damaged.

## Does size matter?

Why is **EA DATA. SF** so large? As you probably know, the FAT file system allocates space in units called clusters. Disks are physically formatted into 512 byte sectors. The File Allocation Table has room for only 64K pointers to units of disk space, these are clusters. The larger the drive, the more sectors must be

included in each cluster to account for all the space on the drive, since there can only be a maximum of 64K clusters.

On today's large drives, cluster sizes are often 16K or even 32K; a file with less data than a cluster takes up a full cluster. If it grows by even one byte more than the cluster size, the file takes up two clusters. The waste space is called *slack space*.

OS/2 allocates a cluster to hold a file's EAs, even when the file has only a single byte of extended attributes; that's because the cluster is the smallest amount of space that can be allocated. Since plenty of files on an OS/2 boot drive have EAs, lots of space is allocated in **EA DATA. SF**—most of it slack space.

On FAT drives used by OS/2, the size of **EA DATA. SF** depends on the number of files and directories that have EAs, and whether the applications you attach EAs to all the files that they touch. There is no simple rule of thumb for determining how large the file will be. **EA DATA. SF** can range from a few hundred kilobytes in size to many megabytes. But you can't get rid of **EA DATA. SF**, and there's no way to directly manipulate the file.

The links between EAs and the files to which they belong can sometimes get broken. When this happens CHKDSK finds orphaned EAs and collect them into files with the name **EA#####.CHK**, where # is a number. Usually, there's no practical way to put these orphan EAs back with their files.

The important things to remember are that **EA DATA. SF** is a part of the OS/2 file system on FAT drives, and that it can be damaged by DOS based disk utilities, or sharing a FAT drive with Windows 95. **EA DATA. SF** can become very large if you have a large number of files with EAs on a large FAT drive, with large file allocation clusters. ☹

Doug Yriart is a stage manager, actor, and founder of an award-winning community theater. He's also an OS/2 advisor on the IBM CompuServe forums. To keep the wolf from the door he finances these activities with a day job working for a government agency in Washington, DC.



# two warped Making my net work

by Judy McDermott

Judging from the many questions pertaining to LAN installation and configuration posted in mailing lists and newsgroups, setting up a network is considered a difficult task.

To reassure you that the situation isn't as bad as it seems, I thought it might be helpful to describe the setup of my personal home LAN. I won't cover installation of Windows 95, other than configuration of the Microsoft Network.

I'll take you through the installation and configuration process step by step (although it may be overkill for some).

A LAN allows you to share files, modems, printers, and other hardware. A network can range from two devices that share information, up to several hundred workstations connected to servers.

I won't define the protocols here; that information is readily available in the OS/2 information guide or on the Internet, and I don't have room for it anyway.

## IP address selection

LANs have specific classes of IP addresses. They do not route through the Internet and cannot be accessed from outside of the network. (Information about the classes can be found online in RFC-1597.) Class C is commonly used for small networks; because they're contiguous, they may be treated as larger networks, up to the maximum of 254 addresses. So, using Class C, you could have machines with IP addresses of 192.168.1.1, 192.168.1.2, ... up to 192.168.1.254. You cannot use 192.168.1.0 or 192.168.1.255, because they're reserved for the network and broadcast addresses.

## MCD

My personal LAN consists of three machines that reside on the network known as **MCD**. Each machine has a name. My setup includes OS/2 Peer.

For my network, I'm using a Western Digital WC8013C Network Interface Card (NIC) in each machine. They're connected to a LinkSys 5-port Workstation hub using various lengths of CAT5 10BaseT cable.

I assigned the **JUDYMC** computer an IP address of 192.168.1.1. It's running OS/2 Warp 4.0, and is acting as Host/Server. This machine connects to the Internet. Loaded on **JUDYMC** are a network adaptor, IBM TCP/IP, IBM OS/2 NETBIOS, and the file and print client.

The **MICKEY** system is assigned IP 192.168.1.2. It uses OS/2 Warp 4.0, and is simply a workstation. I've loaded support for the network adaptor, plus IBM TCP/IP, IBM OS/2 NETBIOS, and the file and print client.

The **BRLANNA** computer (IP 192.168.1.3) is a Windows 95 workstation. It's also the print server. The protocols it uses are the network adaptor support, IBM client for

# Database Management

for **C/C++ & REXX**

## dbfLIB for C and C++ Development

- ✓ Supports DBF, DBT, FPT, NDX and NTX file formats.
- ✓ Accesses data safely in multithreaded programs.
- ✓ Provides indexing, memo fields, network support and soundex searching.
- ✓ Runs on OS/2, Windows, Windows 95, Windows NT and MS-DOS.
- ✓ Handles IBM, Microsoft, Borland and Watcom compilers.

---

## dbfREXX for REXX Development

- ✓ Supports DBF, DBT, FPT, NDX and NTX file formats.
- ✓ Accesses data fields directly with stem variables.
- ✓ Provides indexing, memo fields, network support and soundex searching.
- ✓ Supports VX-REXX, VisPro REXX and the built-in REXX interpreter.

---

**dSOFT Development Inc.**  
281-537-0318 [www.dsoftusa.com](http://www.dsoftusa.com)



Come visit us!

Southern California  
**OS/2**  
User Group

[www.scoug.com](http://www.scoug.com)

© Copyright 1997 Southern California OS/2 User Group. ALL RIGHTS RESERVED.

## Take control of your fonts!

with

# FontFolder

The OS/2 Font Manager

Install ♦ Uninstall ♦ Browse ♦ Print

Use fonts directly from CDROMs

"Every font management function I could possibly use" - OS/2 Mag.

Available from BMT Micro, Indelible Blue and other OS/2 sources

 [www.pvsoft.com](http://www.pvsoft.com) [ccullum@ibm.net](mailto:ccullum@ibm.net)



Microsoft Networks, NetBEUI, and TCP/IP. It also has file and printer sharing for Microsoft Networks.

Additional services and protocols are available depending upon your networking needs. Select "Help" during installation for assistance. After you install OS/2, open the Assistance Center folder, select Information, then TCP/IP Command Reference.

### Installation steps

If you've installed OS/2 Warp 4 before, you'll have several new options to choose from when you install networking support.

At the "OS/2 Warp Setup and Installation" screen, select File and Print Client and TCP/IP Services. (Other options are available; select Help if you think you need more info.)

The "Configuration Screen" lists which services are available. Select File and Print Sharing Services; this allows you to share files, printers and hardware across the LAN. Fill in the workstation Name; enter a name that is unique to this particular machine. For example, my machine is known as JMCDERM. Choose a descriptive workstation description, such as My WarpServer. The domain name (MCD, in my case) is used by each machine that shares resources on the LAN. Select Install Sharing.

Make sure you enter the information for the User ID and Password fields, and don't lose it!

You can install TCP/IP at install-time, or later on, through the TCP/IP Configuration notebook once installation is complete. Since I chose the latter, I'll discuss it in the configuration section. You will receive a "Configuration" notice when you proceed to the next step; that's OK.

If the NIC was detected during installation, it will be listed under Network Adapters. If so, clicking on the red arrow will change to green. If the NIC isn't automatically recognized, you'll need to add the support.

If the NIC was detected, you'll see a list containing the Network adapter, 0-IBM OS/2 NETBIOS and 0-TCP/IP. Click on "Network Adapters and Protocol Services; again, the red arrow will convert to

a green check mark if configured correctly. If the NIC wasn't detected, select "Add Adapter." If your network adapter isn't listed, select "Other Adapter" and install the driver from floppy. Add the protocols listed above.

Once you have the NIC installed, the red arrow will convert to a green check mark. Click "Install" and continue installation.

### OS/2 configuration

Once OS/2 has completed its installation and you've "killed the elephant," it's time to configure TCP/IP and NetBios. I'll use the IP address that are used on my LAN and will only cover sections needed to get your machines communicating and sharing.

Open the following folders: OS/2 System, System Setup, TCP/IP Configuration (LAN). Under Network, my settings appear as follows:

- ☐ Lan interface 0
- ☐ Configuration Options
- ☐ Enable interface and Manually Using
  - ☐ IP address: 192.168.1.1
  - ☐ Subnet Mask: 255.255.255.0
  - ☐ Enable the loopback interface: using IP Address: 127.0.0.1
- Under Routing, I've added
  - ☐ Route type: NET
  - ☐ Destination address: 192.168.1.1
  - ☐ Router Address: 192.168.1.0
  - ☐ Metric: 1
  - ☐ Subnet Mask: 255.255.255.0
  - ☐ Enable IP Forwarding

On the Hostnames page, I entered MANDIE as my machines' hostname. This appears in the config.sys as SET HOSTNAME=MANDIE. The Local domain name is ameritech.net; this is my ISP.

Under Nameserver addresses, I added 206.141.193.243 and 206.141.251.2. These are provided by your ISP and may be referred to as your Destination IP Address and/or Domain Nameserver.

The Autostart section allows you to select the services that will start automatically. For full details see TCP/IP Command Reference, inetd.

Username: Specify the name of the user authorized to log on to your workstation using the REXEC server. This username is also used by your line printer (LPR) client.

This sets a USER environmental variable in the config.sys.

Under Security, specify a telnet password that will be required for authorized users to log on to the host using the Telnet server.

For FTP access protection, choose "Add" and complete the fields. This will create the file x:mptnrusers.

Servers are self explanatory. Socks, Mail, and Sendmail aren't used with this setup.

Since I'm using remote printing, I filled in RISKY for my Remote print server, and LPT1 for Remote print server's printer. This is configured on the Windows95 machine to allow other machines on the network to share the printer.

Finally, exit and save your changes. Don't reboot at this point.

### But wait, there's more!

Open the "MPTS Network Adapters and Protocol Services" folder and select "Configure." Select NetBIOS Socket Access, then "Configure." You should now see your NetBios hostname. Select "OK." The Status will now be Configured. Shut down and reboot.

The MICKEY workstation has the same configuration as above with a few exceptions. The IP Address is 192.168.1.2. Under routing, I chose

- ☐ Route type: type D for Default
- ☐ Router address: 192.168.1.1.

This automatically adds a Net entry, also.

- ☐ I didn't select IP Forwarding on this machine.

For Hostnames, I chose this machines hostname: MANDIE. Continue configuration to meet your needs. Once NetBIOS is configured, shut down and reboot. MICKEY can now ping 192.168.1.1 and JMCDERM can ping 192.168.1.2. Now we're talking!

### Getting BRIANNA going

To install Microsoft Networking, I opened the following folders: My Computer, Control Panel, Network. I installed:

- ☐ Client for Microsoft Networks
- ☐ Network Adapter
- ☐ NetBEUI
- ☐ TCP/IP
- ☐ File and Print Sharing for Microsoft



## ○ Networks

Then it was time to configure the Client for MS Networks. The Network Adapter was detected during the installation, and I didn't need to make any changes to NetBEUI. Under the TCP/IP (Properties), I selected "Specify an IP Address" and entered

○ IP Address: 192.168.1.3

○ Subnet Mask: 255.255.255.0

I disabled WINS Configuration, and left Gateway alone. I didn't do anything with Advanced configuration options.

Under DNS Configuration, I chose Enable DNS and entered:

○ Host: Bri

○ Domain: MCD

○ DNS Server Search Order:

○ 206.141.193.243 "Add"

○ Primary Network Logon:

○ Client for Microsoft Networks  
Then I clicked on "File and Print Sharing" for access options:

○ Computer name: Brianna

○ Workgroup: MCD

○ Description: Your choice

When you select OK, the machine will shutdown and reboot. All machines on the LAN can now ping each other and share resources—after you set up access permissions on each machine.

## Internet Access

JMCDERM uses the InJoy Dialer, which allows the option of IP Masquerading. MICKY and BRIANNA have been configured with the "Default Route" allows them access to the Internet through JMC-DERM.

InJoy Dialer is a product of F/X Communications, at [www.fx.dk](http://www.fx.dk). It has been rated as one of the top OS/2 programs. It's a very inexpensive way to share an Internet connection over a LAN. It's very easy to setup and configure, offering such options as redial, autostart of programs, alternate phone numbers, a "Ticker" and much more. Software must be registered to use the IP Masquerading feature. It's well worth the money, in my opinion. I

used it with my USR 33.6K modem and now use it with 128K ISDN.

## What happened?

If you run into trouble, here are a few readme files that might help.

○ Error Messages Reference

x:\IBMLAN\ERROR.TXT

○ README.MPT for Multi-Protocol Transport Services

(MPTS\*) x:\IBM-

COM\README.MPT

You really should know the name of your network adapter prior to installation. If it's not supported directly, obtain the OS/2 compatible driver before you get started. It's also helpful to know the IRQ and I/O address, in case you run into a conflict. ☹

# LOOK!

Increase your productivity with these two great products from AVIAR!

## 1. "Object REXX by Example"™

The **book** that teaches you **Object REXX** the easiest way possible - by example.

*By:* Gwen L. Veneskey

Will Trosky

John J. Urbaniak

*Check out*

<http://www.oops-web.com/orxbyex/>  
for a Table of Contents

## 2. "V Trex"

Speech-activated, natural-language queries into your DB2/2 Databases.

"Information at your fingertips?"  
*Been there, done that. Feh!*

**INFORMATION... at your COMMAND!**

*Check out*

<http://www.oops-web.com/vtrex/>  
for some screen shots

Available from INDELIBLE BLUE or direct from AVIAR

Web: <http://www.indelible-blue.com/>

Web: <http://www.oops-web.com>

Telephone: 1 800-776-8284

Telephone: 1 412-488-9730



software that soars!

219 Fingal Street, Pittsburgh, PA 15211

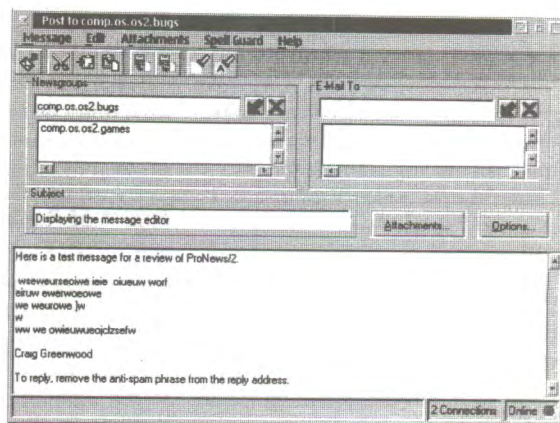


## by Craig Greenwood

The second Control Panel tab displays All Groups. All the groups on the server are displayed in a tree view, with every branch initially collapsed. You can scan down the list of level-one subgroups and double click on the “+” signs to expand the branches. I like this display method

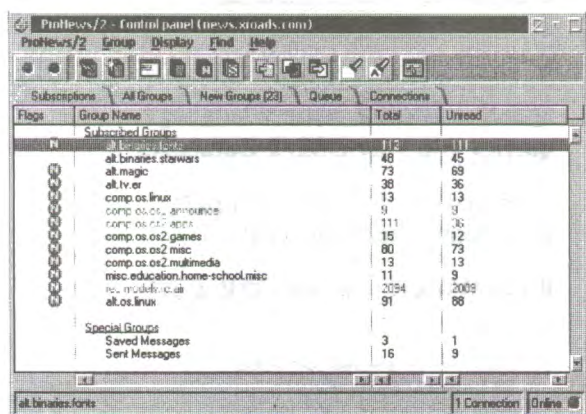
The Queue Manager displays a list of jobs that are being executed, or waiting to be executed. Jobs can be stopped, started or re-prioritized from this list. A pop-up menu is available here which presents the options to: Move, Execute Now, Stop, Kill, or Kill All Tasks. I find Move and Execute Now very useful. For example: I will often begin downloading a long list of headers for several newsgroups. While I'm doing so, I'll want to browse the headers of another group. In other programs, if I saw an article that I want to read, I had to wait for the previous operations to finish before I could download the article. With ProNews/2, you can specify that a task or tasks be executed immediately, moved up or down in the queue, or move it to the top or bottom of the queue.

The Control Panel has its own configurable button bar, as does



Items in the message headers windows indicate various conditions, such as: new message as of the most recent update, read, locked, or no longer on the server. I was fascinated to discover that if someone crossposted to more than one group and you already read their message in one newsgroup, if you open another newsgroup that the same message was posted to, it was already flagged as read. You may have as many newsgroup windows open at one time as you want.

In ProNews/2 you can have both “global” filters, and filters specific to a newsgroup. A “Filter Wizard” helps you create filters based on several different criteria. When a filter is created it is immediately applied to the current header list; it doesn’t have to wait until downloading new



The third tab displays the groups that have been added to the All



headers to test for the specified condition. If a group does have some headers highlighted as a result of a filter that you set, that group is also be highlighted in the "subscribed groups" list. This is really handy; you don't have to open each group to see if any of your filters caught something of special interest.

## Posting

So, you have been lurking long enough. You're ready to wander over to comp.os.wombat95.sorry.os to start a flame war. You have several ways to post, follow-up, reply by email, or follow-up and reply by email.

Any of these choices bring up a "posting window." The "posting window" has address fields for both newsgroups and email. Right-clicking on the field for newsgroup addresses pops up a list of all the groups you are subscribed to for easy picking and cross-posting. The bottom of the "posting window" include an editing field where the actual message is typed in. A great bonus is the Spell Guard spell checker which can be used by "spell-challenged" people like me to check notes before sending them out.

It is a simple matter to attach files to outgoing messages, and you have a choice of either UUencode or Base64 encoding.

You can either automatically or manually add signatures to messages. Each group can use the default signature, or have one that is specific to that group.

One feature that I have occasionally had a use for, but which ProNews/2 does not have, is the ability to send Carbon Copies and Blind Carbon Copies. I ended up, instead, putting all my intended recipients in the "to" field. This is not a glaring omission, though. And, after all, this is a newsreader, not an e-mail application.

## "No-spam address" option

To misquote Obi-Wan Kenobi "Newsgroups can be a wretched hive of scum and villainy." As a result, you may want to disguise

your "reply to" and "from" email addresses like "dont\_spam\_on\_me\_craigg@bigfoot.com." The savvy newsgroup user can recognize the "dont\_spam\_on\_me\_" part as an attempt to foil automated-address-sucking-spam-broadcasting-weasels and remove it from your address before sending something to you. ProNews/2 gives you an option to use your disguised address when posting to newsgroups, but send your real address when emailing someone specific. If you are posting and emailing at the same time, it knows which message should get which "from" address.

## Binaries

I suppose that you have heard about the binaries newsgroups that are available on the Internet, like alt.binaries.fonts. Oh yeah, there are pictures groups, too, such as... alt.binaries.starwars.

With ProNews/2, retrieving binary files is easy. And you have a choice.

- Double click on a binary header. The binary is decoded and placed in the directory you specified for decoded binaries. This can be the global default, or you can set a specific Decoded directory for selected newsgroups. You can then view decoded binary images by clicking on the file name in the Message window and Netscape will be launched as a viewer.
  - Select one or several headers, right click, and select decode. A secondary menu is available in case you want to decode manually.
  - Select one or more headers and click on the "decode" button on the button bar.
  - Open a binary newsgroup and select "retrieve all article bodies" from the "Group" menu (not recommended unless you have a massive storage space and a really fast Internet connection).
- Multi-part binary files are detected and ProNews/2 automatically searches the newsgroup for all parts before downloading and decoding. If one or more parts is not on the

server, ProNews/2 will highlight the parts that are present, and abort the download/decode. In this case, you still have the option to decode the available parts manually.

## Conclusions

Is ProNews/2 worth the \$30 registration fee? In my opinion, the answer is a resounding yes. (The crowd cheers in the background).

This is a very configurable newsreader that exploits the functionality that OS/2 offers. Clearly, the authors put a lot of thought into the features that are included. It appears to have been well tested before being released, as opposed to being rushed out the door for whatever reasons some developers choose.



While ProNews/2 is only at release 1.0, it has the depth and feel more like a 3.0 release. If you are skeptical of my assessment, click on over to BMT Micro and try it out yourself for 45 days. But, please, if you continue using it (and I'm confident that you will), register it. Quality shareware needs to be supported if we want to continue having quality choices.

ProNews/2 is distributed by BMT Micro as shareware with a 45 day unhindered evaluation timer built-in. After this time there will be a delay upon starting the program. As shareware, a printed manual is not available, so what you don't pick up intuitively will need to be learned via the on-line help (which is well written and organized).



# Internet Adventurer

by David Ameiss

Adventure Software's Internet Adventurer (IA) is a suite of utilities that allows integrated access to email, News, FTP, Telnet, Web browsing, and Internet Relay Chat (IRC). The version I reviewed is the latest publicly-available version, 1.21.

## Getting started

IA is distributed as a zip file. Unzip it into a temporary directory, then run the install program supplied. The installation program allows you to specify the destination drive and directory. In addition, you can specify whether to unzip the files, insert the IA icon in the startup folder, view the README file, and create the desktop folder. The last is useful if you're recovering from a desktop problem and just need the icons back.

3D scrolling title bars are standard throughout the program, but they can be disabled. A lot of work went into these icons! Each window also has a button bar, which is completely customizable; a large number of functions may be assigned to each button.

Most of the window is taken up by a Notebook with four tabs: Navigate, Quicklist, WebWatch, and Address Book. The Navigate page

contains buttons for most of the major functions: WWW, IRC, News, Mail, Telnet, FTP, and a shortcut to the WebWatch page.

Quicklist, similar to Netscape's bookmarks, contains a multilevel list of URLs, along with a nickname for each. When you double-click on one of them, IA processes the URL. IA handles a long list of URL types, including http, ftp, gopher, irc, and so forth. In most cases, it brings up the browser to handle the URL, but you can customize this.

## Excellent URL management

On the General Settings page is a field called "URL REXX Script." If

you fill in this field, the specified script is run, passing the selected URL. The author provides an example as the basis for your own customization. FTP URLs can be handled by your favorite FTP utility, IRC by a preferred chat program, and so forth.

This intelligent URL handling is throughout the program. In a mail message, if you double-click on a URL, it is handled in the same way. Same for news, and so forth. It's pretty powerful!

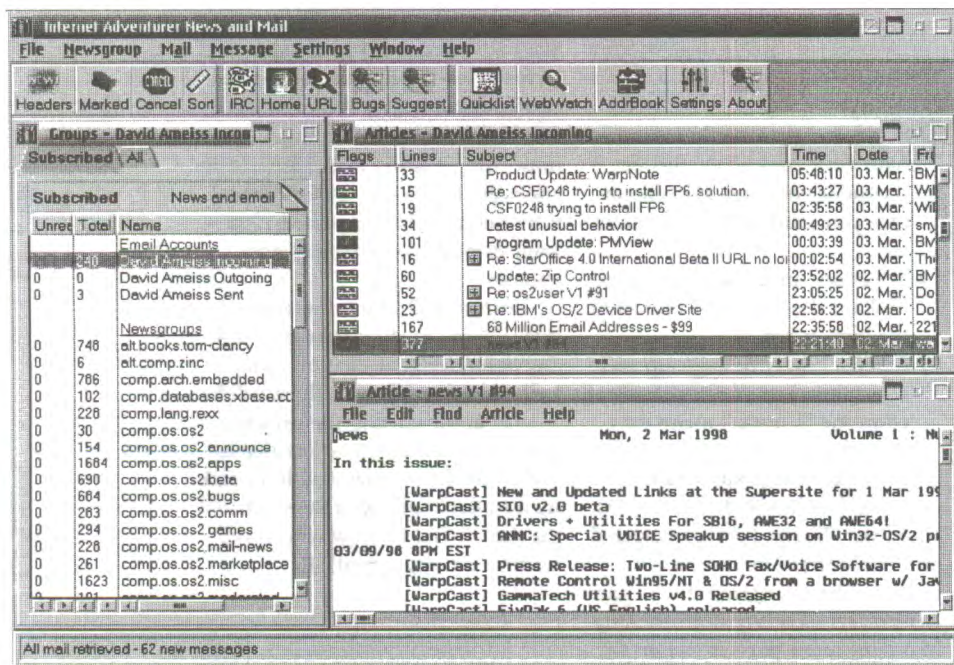
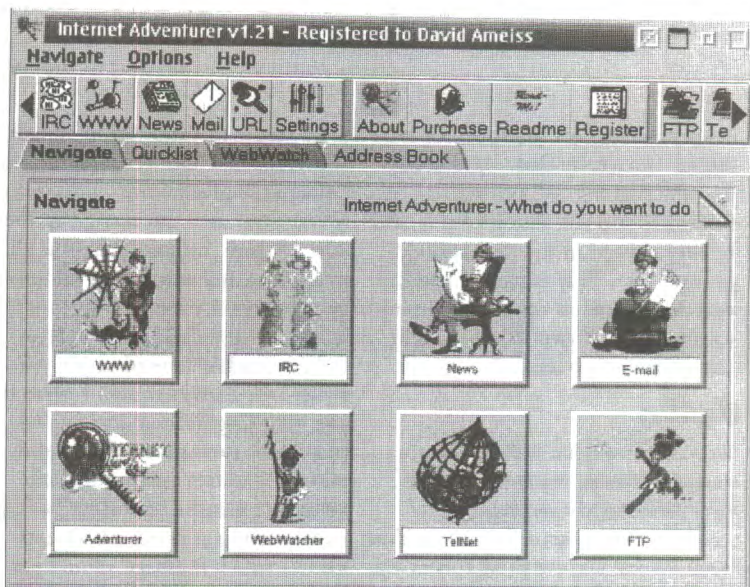
IA can automatically check any number of web pages for changes using WebWatch. When one changes, IA beeps, plays a WAV file, or sends an email. The Address Book is, as expected, a place to keep your email addresses.

## Other tools

At this time, FTP and Telnet simply run FTPPM and TELNETPM, respectively. The author indicated that allowing hooks to alternate FTP and Telnet programs are on his to-do list. Alternate FTP programs can be used via the intelligent URL handling described earlier.

IA uses either WebExplorer or Netscape. If Netscape is currently running, IA can feed in a new URL without opening a new instance.

I have to confess, I don't use IRC. However, from what I've seen, IA has a very thorough implementation. In addition, IA supports REXX scripts in IRC, and claims a





high degree of compatibility with GT-IRC scripts.

## News and mail

The core of the program is News and Mail. These are tightly integrated, to the point that they are almost indistinguishable.

The screen is divided into three windows. Along the left is a list of groups, including your mail accounts (multiple accounts are supported), newsgroups to which you're subscribed, custom groups, and some special groups. Each group includes an Unread and Total count. The number of unread messages in a group is displayed in red.

For each mail account, three groups are created: Incoming, Outgoing, and Sent. Mail which you send gets put into Outgoing, until it is successfully sent, at which point it is moved into Sent. Incoming messages are put into Incoming.

Custom groups allow you to organize your messages. You can easily create new groups at any time. These groups are not multilevel.

The top right window lists all of the articles in the Group which is currently selected. Unread messages can be displayed in a different color. The bottom right window contains the text of the selected article or message.

The fields displayed in the List of Articles window can be customized on both a global and group basis. You can customize article sorting in the same way.

Only one News Server can be defined. However, when you subscribe to a newsgroup, the news server is recorded with the newsgroup. Thus, you can set a particular news server, subscribe to the newsgroups you want, then switch servers, subscribe to another set, and so forth. Effectively, you have an unlimited number of news servers available.

IA also provides a powerful filter facility. Filters may be applied to incoming and outgoing mail and news. You may select on strings within the message, message size, or presence of attachments. Multiple criteria may be applied in a single filter, and you can specify that all or any criteria must be met. Actions on a filter match include downloading the body (for news articles), running a REXX script, saving attachments, alerting via beep or a WAV file, copying or moving to a custom group, and deleting. You can also specify to stop filtering, which

**News and Mail are tightly integrated, to the point that they are almost indistinguishable**

implies that multiple separate filters may be applied to a single article. At this time there is no facility to manually apply a filter.

## Getting help

IA is at its weakest in documentation. Choosing Help brings up your browser of choice and points to the IA Website. However, the information is somewhat sparse, and it's difficult to learn how to use IA from this site. Your best bet is experimentation.

The author, Kim Rasmussen, has been very responsive in replying to questions or problem reports. You can send email to a support address for problems or questions, and an active support mailing list is maintained.

## Problems

I've only run into two significant problems. Both began happening only after my message base grew very large. (More than 6,000 mail messages and 5,000 news article headers—I'm a bit of a packrat.)

First, there appears to be a memory leak. After a long session on my 128MB machine, free memory disappeared. Exiting IA seems to free up the memory. Second, switching between virtual desktops in Object Desktop took a long time when running IA, sometimes as long as 10 seconds. This appears to be a PM message queue issue. After exiting IA, the delay disappears.

In all fairness, I've just recently reported these problems to the author, and I fully expect that he will address them promptly.

## Summary

IA is a full-featured suite with a tremendous amount of power and flexibility. I would not hesitate to recommend it to anyone looking for an all-in-one internet suite solution. Support is excellent, and I'm confident that the author will continue to enhance the product.

IA is available from most OS/2 sites, such as the OS/2 SuperSite, or directly from the author's Web site at [www.inetadv.net](http://www.inetadv.net) or [home3.inet.tele.dk/krasmus/](mailto:home3.inet.tele.dk/krasmus/).



# history Coming events

This is a list of events scheduled by the Phoenix OS/2 Society and other OS/2 user groups. Unless otherwise noted, active members may attend any scheduled event for free. (Other groups may have different attendance policies. Please check their Web sites for information about meeting schedules and attendance policies.)

## Meeting notes

For the latest updates on the Society's event calendar, check the Web site at <http://www.possi.org>.

For meeting information and other queries, call the Phoenix OS/2 Society's voice mail at 602-949-4341.

If you have suggestions, ideas, or comments on the content of general meetings, contact the Society's Program Chair, Esther Schindler, at the general meetings or send email to [esther@bitranch.com](mailto:esther@bitranch.com).

April						
S	M	T	W	T	F	S
				1	2	3
4	5	6	7	8	9	10
11	12	13	14	15	16	17
18	19	20	21	22	23	24
25	26	27	28	29	30	

May						
S	M	T	W	T	F	S
					1	2
3	4	5	6	7	8	9
10	11	12	13	14	15	16
17	18	19	20	21	22	23
24	25	26	27	28	29	30
31						

June						
S	M	T	W	T	F	S
		1	2	3	4	5
6	7	8	9	10	11	12
13	14	15	16	17	18	19
20	21	22	23	24	25	26
27	28	29	30			

July						
S	M	T	W	T	F	S
				1	2	3
4	5	6	7	8	9	10
11	12	13	14	15	16	17
18	19	20	21	22	23	24
25	26	27	28	29	30	31

## April 1998

- 5** Magazine submission deadline for May issue. Articles should be sent to [editor@possi.org](mailto:editor@possi.org). For other arrangements, call 602-585-5852.

- 7** net.sig (Internet SIG). Meeting is 6:00pm to 8:00pm. Coordinator Mike Briggs. Location: KDC, 2999 N 44th St, 4th floor, Phoenix.

- 7** HOW (How OS/2 Works) GIG. Meeting is 6:00pm to 8:00pm. Coordinator Lyle Wilson. Location: KDC, 2999 N 44th St, 4th floor, Phoenix.

- 14** General meeting; Southsoft's PMMail and PMNews. Meeting is 7:00pm to 9:00pm. Q&A session is 6:30pm to 7:00pm. Location: Mountain Preserve Reception Center, 1431 East Dunlap, Phoenix.

- 18** SCOUG: Southern California OS/2 User Group meeting, 9:00am, Costa Mesa, CA. See [www.scoug.com](http://www.scoug.com) for agenda and directions.

- 25** Board meeting and magazine prep. Meeting is 10:00am to 1:00pm. Eat a brunch, learn about the inner workings of the Society, and help get extended attributes ready to mail. Location: Bill and Esther Schindler's house in north Scottsdale, 9355 E Mark Lane. Call 585-5852 or send email to [esther@bitranch.com](mailto:esther@bitranch.com) for directions. Remember to bring a potluck dish to share, too.

- 27** BAUG: Bay Area OS/2 User Group meeting, 7:30pm, SLAC, Menlo Park, CA. See [www.os2baug.org](http://www.os2baug.org) for agenda and directions.

## May 1998

- 5** net.sig (Internet SIG). Meeting is 6:00pm to 8:00pm. Coordinator Mike Briggs. Location: KDC, 2999 N 44th St, 4th floor, Phoenix.

- 5** HOW (How OS/2 Works) GIG. Meeting is 6:00pm to 8:00pm. Coordinator Lyle Wilson. Location: KDC, 2999 N 44th St, 4th floor, Phoenix.

- 5** Magazine submission deadline for June issue. Articles should be sent to [editor@possi.org](mailto:editor@possi.org). For other arrangements, call 602-585-5852.

- 12** General meeting. Meeting is 7:00pm to 9:00pm. Q&A session is 6:30pm to 7:00pm. Location: Mountain Preserve Reception Center, 1431 East Dunlap, Phoenix.

- 14** Toronto: Toronto OS/2 User Group meeting, IBM Canada Building. DBExpert and Year 2000 issues. See [www.to2.org](http://www.to2.org) for directions and details.

- 23** Board meeting and magazine prep.

## June 1998

- 2** net.sig (Internet SIG). Meeting is 6:00pm to 8:00pm. Coordinator Mike Briggs. Location: KDC, 2999 N 44th St, 4th floor, Phoenix.

- 2** HOW (How OS/2 Works) GIG. Meeting is 6:00pm to 8:00pm. Coordinator Lyle Wilson. Location: KDC, 2999 N 44th St, 4th floor, Phoenix.

- 5** Magazine submission deadline for July issue. Articles should be sent to [editor@possi.org](mailto:editor@possi.org). For other arrangements, call 602-585-5852.

- 9** General meeting. Meeting is 7:00pm to 9:00pm. Q&A session is 6:30pm to 7:00pm. Location: Mountain Preserve Reception Center, 1431 East Dunlap, Phoenix.

- 27** Board meeting and magazine prep.

## July 1998

- 5** Magazine submission deadline for August issue. Articles should be sent to [editor@possi.org](mailto:editor@possi.org). For other arrangements, call 602-585-5852.

- 7** net.sig (Internet SIG). Meeting is 6:00pm to 8:00pm. Coordinator Mike Briggs. Location: KDC, 2999 N 44th St, 4th floor, Phoenix.

- 7** HOW (How OS/2 Works) GIG. Meeting is 6:00pm to 8:00pm. Coordinator Lyle Wilson. Location: KDC, 2999 N 44th St, 4th floor, Phoenix.

- 14** General meeting. Meeting is 7:00pm to 9:00pm. Q&A session is 6:30pm to 7:00pm. Location: Mountain Preserve Reception Center, 1431 East Dunlap, Phoenix.

- 25** Board meeting and magazine prep.



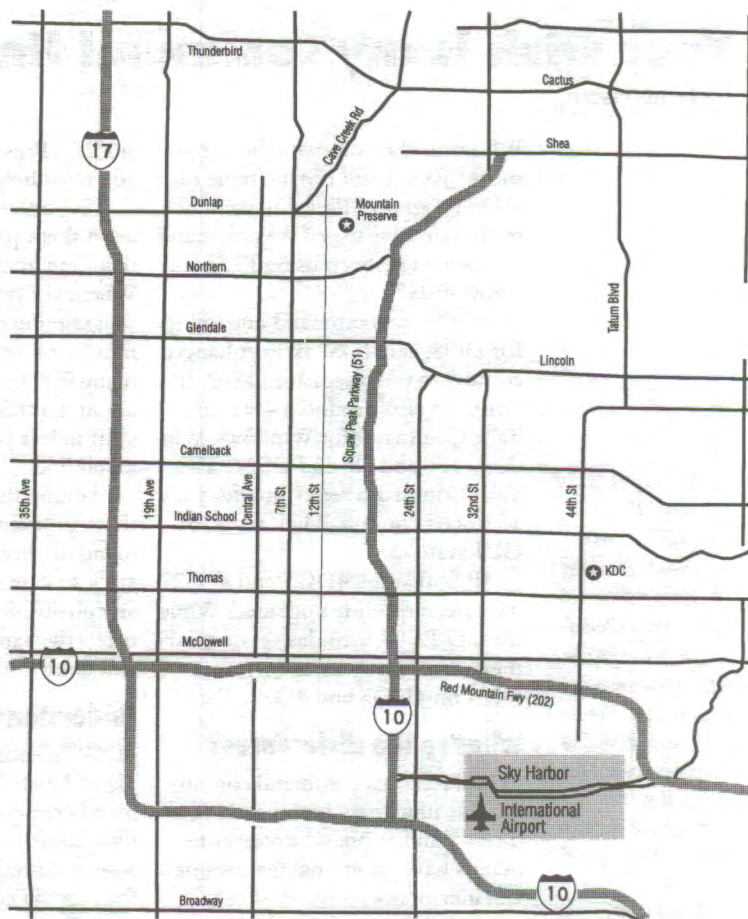
# Meeting locations

General meetings are held at the Mountain Preserve Reception Center, 1431 East Dunlap, Phoenix.

From the Black Canyon, exit at Dunlap and head east. From the Squaw Peak, exit at Northern. Go west to 12th Street, turn right and go north to Dunlap, turn right, and it's two blocks up on the right.

The "How OS/2 Works General Interest Group" and the Internet SIG (net.sig) meet at Knowledge Development Center, 2999 N 44th St, Suite 400. That's just north of Thomas, in the building with the green dome. Plenty of free parking space is available in the garage behind the building. ☺

If the mailing label on the back cover says "sample," then this may be the only copy of extended attributes that you will ever receive. If you want to keep getting the magazine (and receive all the other benefits of membership), you must join! A 12 month membership in the US is only \$30. (See the form for membership pricing in other areas.) Tear out the application form, fill it in, and mail it with the membership fee to the Society's address.



## SIG news

### net.sig

by Mike Briggs <mike@possi.org>

I had been saying for quite some time now that we'd look at filters for email. Filters to sort email, stop spam, and block certain people or domain names.

Last meeting I got to that subject at last. We downloaded a demo copy of PMMail and looked at its filtering capabilities. I showed how any email from family members could be sorted into a Family directory I created. One you create some "boilerplate text" in PMMail you can set an auto response or auto forwarding of that boilerplate to an address. A good spam filter was discussed; we'll never stop all of it, but quite a bit can be killed. Email from any address can be blocked, either a full address or just a certain domain name of origin.

I believe that MR/2 ICE, the other popular OS/2 email program, has filtering just as powerful. So there is no reason to keep getting unwanted email, or to have to sort all your incoming mail by hand. By the next meeting I should have a laptop computer; getting that hooked to the Internet may be next meeting's project.

See you at the next meeting, April 7, 6:00pm.

### HOW GIG

by Stan Kroppen <skroppen@ibm.net>

The February HOW GIG featured a Freelance slide presentation by Lyle Wilson on "Why REXX." He explained that learning REXX code first is not necessarily the best place to start without knowing where and how REXX can be used. The presentation will be available from the HOW GIG home page.

Lyle spoke about searching for files and embedded text, using REXX with FTP and the Internet. The ability to download Web pages at 2:00am while sleeping is one of his favorite usages.

Lyle has very good REXX skills and does programs as a vocation. He has agreed to continue alternate HOW GIG presentations to educate those interested in REXX.

Since Robert (Rosey) Rosenwald is taking some "R&R" in March HOW GIG, Lyle agreed to continue with his February presentation at the March meeting.

In April, the HOW GIG will begin meeting at the Knowledge Development Center from 6:00pm to 8:00pm. ☺



# review Your wish is my command line: 4DOS and 4OS2

by Ernie Fisch

JP Software  
P.O. Box 1470  
East Arlington, MA 02174  
617-646-3975  
4DOS, 4OS2 and 4NT  
\$69.95 each with printed  
Introduction and Installation  
Guide, Reference Manual  
and complete online refer-  
ence documentation  
Take Command (3 versions)  
\$69.95 each with printed  
Introduction and Installation  
Guide, and complete online  
reference documentation,  
Reference Manual \$16.95  
additional  
Win95 Pack (4DOS and Take  
Command/32, all manuals)  
\$99.95  
Windows NT Pack (4NT and  
Take Command/32, all man-  
uals) \$99.95  
Windows Pack (4DOS and  
Take Command/16, all man-  
uals) \$99.95  
OS/2 Pack (4DOS and  
4OS/2, all manuals) \$99.95  
JP CD Suite (all six products)  
\$119.95, manuals set  
\$29.95 additional

Who uses the command line any-  
more? Well, I still run a couple of  
DOS programs. Plus, I make much  
more extensive use of the command  
line since I've been using JP Soft-  
ware's 4OS2.

4DOS is a command line utility  
for DOS, and 4OS2 is an enhanced  
command processor for OS/2. JP  
Software also produces 4NT and  
Take Command for Windows, Win-  
dows NT and 95, and OS/2. The  
Take Command series provides  
advanced command line tools for  
GUI systems.

JP Software's 4DOS and 4OS2  
have been recently upgraded. While  
the CD-ROM includes versions of  
their other software, in this review I  
focus on 4DOS and 4OS2.

## What're the differences?

4DOS replaces `command.com` in  
DOS, adding new commands to all  
of the familiar ones. Several com-  
mands have additional features or  
enhancements.

4DOS greatly expands the ease  
of use and power of the command  
line. It can be used with MS-DOS  
and PC-DOS from 3.1 to 7.1, DR  
DOS, Novell DOS, Open DOS, and  
in DOS sessions under Wombat, or  
Windows 3.0, 3.1, 95, OS/2 2.x, and  
OS/2 Warp 3 and 4.

4DOS also works in the DOS  
window in OS/2. With only a sim-  
ple change to `CONFIG.SYS`, you  
can open a DOS session and still  
have the power of 4DOS.

4OS2 replaces `cmd.exe` in OS/2  
and enhances the OS/2 command  
line the same way as does 4DOS.  
Since OS/2 is a somewhat better  
operating system than DOS it needs  
less enhancement, but 4OS2 still  
provides value. 4OS2 can be used  
with OS/2 2.1 and Warp.

In regard to learning these pro-  
grams, it's most coherent to quote  
the manual: "Once you have 4DOS  
or 4OS2 installed, you can learn to  
use it at your own pace. Each pro-  
gram has more than 90 commands  
and hundreds of enhanced features,  
but you don't have to learn them all,  
or learn them all at once. Relax,  
enjoy the program's power, and  
browse through the manual occa-

sionally. Press the F1 key whenever  
you need help."

I echo this advice. Attempting to  
learn these programs all at once is  
daunting, there is so much in them.  
Whenever you want to do some-  
thing on the command line (or have  
time) look up the command in the  
manual or hit the F1 key to learn  
about it. It takes a while to learn this  
stuff unless you live on the com-  
mand line.

Among the many features of  
these programs are a popup com-  
mand history window, directory  
stack to ease directory navigation,  
an enhanced `dir` command which  
offers two- and four-column output,  
and color coded displays.

## Understanding alias

4DOS' aliases allow simplified writ-  
ing of batch files. The **alias** com-  
mand creates new command names  
that execute one or more com-  
mands, or redefine default options  
for existing commands. In effect,  
**alias** allows simple batch files to be  
written on the fly with little effort.  
For example

```
alias d = dir /w
```

causes your directory to be dis-  
played in wide format when you  
type **d**. As one example: back when  
I used OS/2 2.1 with a Logitech  
mouse, my mouse wouldn't work  
whenever I switched from DOS to  
OS/2. I had to run `pcmouse` in  
DOS before I booted into OS/2. I  
wrote an alias to run `pcmouse`, then  
rebooted the computer; it was much  
easier than doing it manually.

Aliases only exist for the current  
session. However, since you can  
save them in a file, which is run  
when you start a new session, in  
effect they are persistent.

## Batch on wheels

4DOS and 4OS2 allow you to write  
more powerful batch files than do  
normal command processors, and  
they work fine with REXX. 4DOS  
allows BTM files in DOS for faster  
execution.

A lot more commands and  
enhancements are available. For  
example, 4DOS and 4OS2 have a  
command **cdd**. This command

changes both drive and directory at  
the same time. It is amazing how  
handy this is! Another command,  
**list**, file displays a file on screen and  
allows forward and backward paging  
and scrolling. I find **list** much easier  
for viewing files than a text editor.

The JP CD Suite contains six  
programs: 4DOS, 4OS2, 4NT, Take  
Command /16 and /32, and Take  
Command OS/2. Each of these  
programs has its own CD directory  
and its own install program. I loaded  
4DOS and 4OS2, and I also tried to  
load Take Command/32 into Win-  
dows NT. Using the install program,  
only one installation went perfectly.

With 4DOS and 4OS2 I had to  
modify `autoexec.bat` (4DOS) and  
`config.sys` (4OS2). I also had to  
brand each of them, to inform the  
program that I had a licensed ver-  
sion, so it wouldn't nag me. The  
manual explains what to do, so it's  
no problem, but the install routine  
was supposed to do this.

I have used 4DOS for several  
years, but I violated one of my own  
rules. I register shareware if I use it,  
but I used 4DOS so little and the  
cost was so high that I just didn't  
register it. For the same reason I  
never got 4OS2. It was easier to  
muck around a bit rather than pay a  
lot for programs that I'd use rarely,  
for which there were reasonable  
alternatives. (Much of what 4DOS  
and 4OS2 do can be accomplished  
with batch files or REXX programs,  
although it is convenient to have the  
capability built into the command  
processor.)

4DOS and 4OS2 are powerful  
enhancements to the command line.  
They replace the normal command  
processors and allow you to use the  
familiar commands with no prob-  
lem. They also allow you to obtain a  
lot more power as you learn to use  
the replaced commands. They are  
solid, reliable performers and I have  
never seen a problem with them. If  
I spent a lot of time on the com-  
mand line I would not hesitate to  
buy one or both. For an occasional  
user it is hard to justify the cost. ☺



## *Last month* **At home with finances**

by Joel Frey

Let's get practical. I mean really practical. For many people, a home computer is recreational equipment. I don't mean they don't put them to good use, but for many users, email and other internet functions are the most serious applications they have. Unless you work out of your home, these are used more for personal than business reasons.

I'll admit it, I'm a PC tinkerer. Although I used to earn a living with my home system and probably will do so again eventually, it's currently an expensive toy for me. Of course, my excuse is that I could need a technologically current system of sufficient power at any time if my professional situation changes, and until then it's an educational device. Yeah, that's it.

Perhaps the most practical software for the home user is financial software. For many, it's the main reason to get a computer for the home. It's no coincidence that Intuit is perhaps the most successful independent software vendor. Quicken and TurboTax are the thorn in Bill Gates' side. In spite of throwing massive amounts of money at Money, Quicken still beat it in a *PC Magazine* comparison recently. And they aren't exactly Microsoft bashers. I find it terribly amusing that one niche MS fails to dominate completely, is the one in which their product is named Money.

In a break from the usual scenario, the OS/2 users' choices for financial software aren't much more limited than they are for the Windows masses. A *PC Magazine* article listed only three retail (Quicken, Simply Money, and Smart Home Manager) and four shareware packages in an also-ran sidebar. Many OS/2 users run Windows and DOS versions of home finance packages. But two OS/2 native personal finance packages are in the Indelible Blue catalog and there's many shareware packages of varying capabilities from other sources.

### **Spitfire comes to call**

InCharge, from Spitfire Software, is one of these. Bruce Landeck, the president of Spitfire, was at our February meeting to show it. InCharge is more than a personal finance package however, since it also has small business and personal property management capabilities. And, although he was hesitant to mention it to an OS/2 user group, this product has something even Quicken and Money don't have: cross-platform capability. Spitfire now offers a Windows 95 version of InCharge that has data compatibility with the OS/2 version.

I've had a copy of Quicken for Windows laying around unopened for a couple of years. I just haven't been that excited about installing it since my real need for financial software was billing and invoices for consulting work. InCharge provides support for these, with the ability to run five different timers to track time for different clients. The billing increment can be set as needed and the time charged to the associated account. Although I rarely had more than one client at a time, I occasionally had multiple projects for one client that had to be billed separately. InCharge would have alleviated that headache.

Naturally, the audience was most interested in comparisons to Quicken. Most questions were couched in terms of whether a par-

ticular function was done the same way as in Quicken. Usually the functionality was at least as good as Quicken's, but in the rare cases it wasn't, Bruce did not hesitate to say so, or if it was done differently, to say why.

Esther's preview of this meeting in the February *extended attributes* provides a much better overview of this product than I can fit in here. A full-function demo version of InCharge is available for download from the Spitfire Web site. For those who see an opportunity to manage their money further by not spending it on InCharge, bear in mind that the demo is locked into a time warp and is stuck at September 15, 1993. The Spitfire Web site is [rampages.onramp.net/~landeck](http://rampages.onramp.net/~landeck). Support is available by phone from 8:00am to 5:00pm Monday thru Saturday, as well as via their Web site, by direct email, and through Spitfire's forum on CompuServe.

At the end of the presentation, Esther provided the following unsolicited testimonial to the customer service provided by Spitfire based on her years as sysop on the CompuServe vendor forum: "There is no vendor I've dealt with over the years who has a better reputation with his customers than this guy. Beloved is probably a very light word. They love the product, they love the support. They love the fact that you would say 'Gee, it would be really nice if...' and a few weeks later it would be in the next version of the product."

I have considerably less enthusiasm for installing that copy of Quicken now. ☹



# building blocks Showing your character

by Marilyn Pizzo

We all use them. We all change them. We even combine them in the same document. What are they? Fonts! A set of characters with a particular size and shape. That sounds easy enough, but the computer needs more information in order to show a font on the monitor or a printout. In addition to knowing how each character is shaped, the computer must know the font's spacing, pitch, height, style, stroke weight, symbol set, and typeface. These characteristics are called font metrics. What do all of these terms mean? Some of them are self-explanatory, but others are not.

## Give me some space

How far apart or close together the letters and numbers should be is called *spacing*. The height of a font is specified in *points*. A point is 1/72 of an inch. *Pitch* is the number of characters per horizontal inch. *Style* is the angularity of the font's characters; "italic" is one example of a style.

*Stroke weight* describes the thickness of the lines in a character. When you change a word to bold, you are changing the stroke weight. A font's *symbol set* indicates the font's intended purpose. Most likely, the symbols are ordinary letters and numbers; if you are a mathematician or engineer you may use special symbol sets containing symbols unique to that line of work.

*Typeface* identifies the design of the font and corresponds to the name of the font. A group of fonts with similar characteristics may belong to a *font family*. There are two different font designs: serif and sans serif. Serif fonts are characterized by curved characters and adorned shapes, whereas sans serif has straight characters and little or no adornment.

## Are you my type?

When you load OS/2 Warp 4, Presentation Manager provides support for TrueType and Adobe Type 1 fonts. The font choices you have to select from during Advanced Installation include Courier, Helvetica, System Monospaced, Times

Roman, Courier (Outline), Helvetica (Outline), and Times Roman (Outline).

You have probably experimented with what these fonts look like. Maybe you've changed the font on your Desktop icons. Or you have written something in your word processing software and changed the font in some way to draw attention. Even italicizing a word or putting it in bold print is changing the font.

So, you aren't sure what these fonts look like or what the one is that is being used on your Desktop? Let's see if we can answer those questions.

Open the OS/2 System folder. Amongst all the goodies you will see System Setup. Open it and locate Font Palette.

When you open Font Palette you see a display of samples of some of the fonts available. You should see a gray box around one of the samples. This is the font that is showing under the icons on your Desktop.

Single click on one of the other samples to move the box so it surrounds a different font type. Press and hold the right mouse button over the box. The cursor changes to a pencil. Drag the font to the area under one of the icons on the Desktop where there are letters and release the mouse button. Notice that the font type changes under all the icons on the Desktop.

In the Font Palette window is an Edit Font button. Click on it. From here you can change the size of the font that's shown in the Font Palette, the font type itself, and the style of the font. Don't make the font size too large or your Desktop will look out of proportion.

Now take a look at the pull down list of names of fonts. There's quite a selection. As you choose each one, the illustration in the Sample box changes accordingly. It is nice to know what you are getting.

As you go through the list, also check out the Style box. Each font type has different styles available. Experiment a little. You can always select the Undo box. You will also notice a block with three options:

Outline, Underline, and Strikeout. Underline is obvious. Strikeout draws a line through the letter. Outline shows the letters in a 3-D effect. (It's a little hard to read, for my taste). As you check each one you can see the effect it has on the letters in the Sample box.

You can also get to the Edit Font window by right clicking on any blank space on the Desktop, choose Settings, and select Change font.

If you really get wild and change things too much, then right click on the Desktop and choose the Settings notebook. Push the Default button at the bottom of the page and everything goes back to normal. You can also change the fonts in any window by going to the Settings notebook and the View tab. A fonts section is there also.

## Adding fonts

To add fonts to your system, select Add from the Edit Font window. A dialog box will ask you to insert a disk or choose the proper drive and directory where the font is.

OS/2 uses Adobe Type 1 fonts and, in Warp 4, TrueType fonts. Adobe Type Manager is an integral part of OS/2. Type 1 fonts require two files for each typeface name. These are .AFM and .PFB. During the installation, the fonts are copied to C:\PSFONTS (or whatever drive letter is associated with your OS/2 operating system).

To install the set of Adobe Type 1 fonts included in OS/2, open the ATM Control Panel. Select the Add button. You will need to change the source directory to point to \PSFONTS\PFM. Select all the fonts listed in the left hand box. Choose **Add** to install the fonts.

Using different types of fonts and different styles of the same font can make a statement as to the mood of what you are doing. Large bold letters are an eye catcher as opposed to small letters. I'm sure everyone has experimented with changing fonts a little. You don't have to wait for next year's family holiday letter to experiment. Go ahead, give it a try. ☺



# info Tripping the light (tables) fantastic

by Bill Schindler

Bill Schindler is the author of *Teach Yourself REXX in 21 Days*, the editor-in-chief of *extended attributes*, and the architect/programmer of the Smack! label program.

Using OS/2 Warp is often a lot like digging for treasure. You may be poking around in the system folders, looking for a file template and instead stumble across a new feature that's as enchanting as a chest of gold. Sometimes, though, it takes a lot more digging before you can lay claim to the doubloons.

Light tables are one of those features that may take some digging. A light table is a special type of Workplace Shell folder that automatically shows you a thumbnail of each image that's shadowed in the folder.

Light tables were introduced with OS/2 Warp 4. If you're using Warp 3, you *may* have light tables after installing one of the more recent Fixpaks; since I don't have Warp 3 running anywhere, I can't tell you. Also, light tables are part of OS/2's multimedia installation. If you didn't install multimedia and you haven't installed Fixpak 4 or above on Warp 4, you won't have light tables available. (Beginning with about Fixpak 4, multimedia is no longer a separate component.)

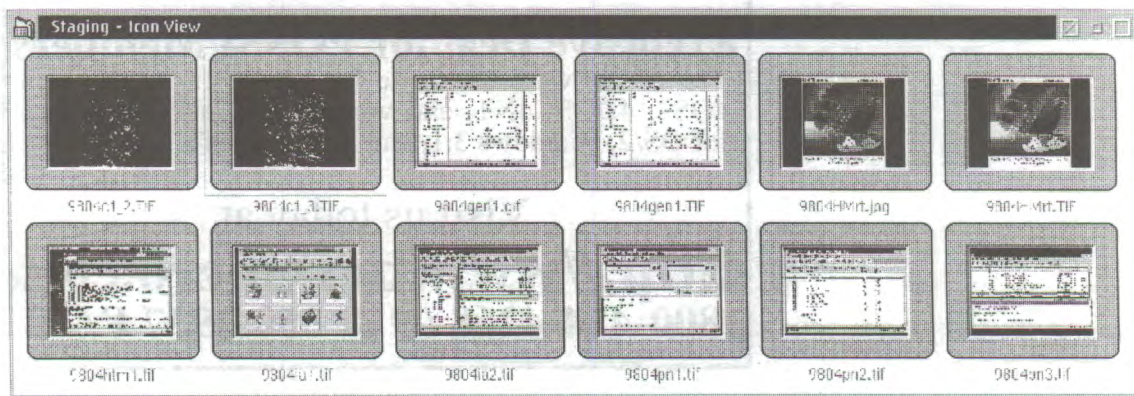
## Digging for gold

In order to see a live example of a light table, you'll need to do a little digging:

- Open the **Programs** folder.
- Open the **Multimedia** folder in the Programs folder.
- In the Multimedia folder, you should find a **Bitmaps** folder and an **Images** folder. Open either one.

The first time you open a light folder, you'll see "slides" for each of the images, each containing a

```
/* LIGHTTBL.CMD -- Create a Light Table folder
* Author: Bill Schindler
*/
CALL RxFuncAdd 'SysLoadFuncs', 'RexxUtil', 'SysLoadFuncs'
CALL SysLoadFuncs
PARSE ARG ' ' title ' ' loadFromDir
IF title = ' ' | loadFromDir = ' ' THEN
DO
  SAY 'Usage:'
  SAY ' LIGHTTBL "<title>" <directory>'
  SAY
  SAY ' Creates a Light Table folder containing' ,
    ' shadows of image'
  SAY ' files in <directory>. Note that the <title>' ,
    ' MUST be in'
  SAY ' quotes!'
  EXIT
END
fl = Translate(Translate(title, '_', ' ^'))
objid = '<TGC_' || fl || '>'
setup = 'OBJECTID=' || objid || ';'
IF SysCreateObject('MMFolder', title,,
  '<WP_DESKTOP>', setup, 'U') THEN
  SAY 'Created' title
ELSE
  DO
    SAY 'Could not create' title
    EXIT
  END
curDir = Directory()
loadFromDir = Directory(Strip(loadFromDir, 'B'))
IF Right(loadFromDir, 1) >< '\\' THEN
  loadFromDir = loadFromDir || '\\'
CALL Directory curDir
exts = "BMP JPG GIF TIF"
DO i = 1 TO Words(exts)
  ext = Word(exts, i)
  fn = loadFromDir || '*' || ext
  CALL SysFileTree fn, 'files.', 'FO'
  DO f = 1 TO files.0
    CALL SysCreateShadow files.f, objid
  END
END
EXIT
```





generic image icon. You'll also see a silhouette of a person shoveling a pile of—let's say dirt—in one slide. The shoveler will move from slide to slide, leaving behind a thumbnail of the image for that file.

What if you want to see your own images in a light table? You could open a drive folder and drag your images into one of the existing light table folders. (Don't worry, you're only shadowing the images, not moving them.)

Or, you could create another light table folder by right clicking on one of the existing ones and selecting **Create another, Light table**. Then drag your images into that light table.

## Automating it

Dragging and dropping image files is quick when you're only interested in a couple files and the directory you're working from doesn't have lots of other files. Selecting ten image files in a directory containing sixty other files can be a real test of your manual dexterity.

So, I wrote a REXX program that may save you from developing a worse case of carpal tunnel.

What the LIGHTTBL.CMD program does is create a light table folder and then shadow image files into the light table. You tell the program what to name the folder and what directory to look in for the image files.

You can type this program in and get it running without knowing a jot of REXX. Just make sure that you use either the System Editor (with word wrap turned off) or the Enhanced Editor. Don't use a word processor unless you're *sure* you know how to save the file as an

unadorned "flat" ASCII file. And make sure you enter the program exactly as it appears here.

If you do know REXX, it should be fairly obvious how the program works. It validates the input, creates a Workplace Shell object of type "MMFolder," and then gets a listing of each known image file type in the given directory and shadows it into the new light table folder.

With a little bit of additional work, you could change the program so that it can run as a program object. A touch of finesse would be to allow the directory of interest to be dropped on the program. (It's a lot simpler to arrange than you might think!) That way you don't even have to go to the command line to create a light table. ☺

P  
r  
o  
f  
e  
s  
s  
i  
o  
n  
a  
l



Software Distribution

## OS/2 Fixpaks on CD-ROM

Stop downloading multi-megabyte Fixpak files and get the latest Warp Fixpaks on CD-ROM for only \$15. Subsequent CDs cost you only \$8! Pop in the CD, and run the installation program to install the Fixpak.

## Exclusive Deal for POSSI Members

The JP Software CD Suite for only \$71.99 - includes 4OS2, 4DOS, 4NT, and versions of Take Command for OS/2, Windows 3.1, and Windows NT.

Visit us today at

**<http://www.bmtmicro.com>**  
**800-414-4268 / 910-350-2937 FAX**



# DeskMan/2

by Craig Greenwood

System Requirements  
OS/2 2.1 or later  
5-10 MB hard drive space  
DeskMan/2  
\$99  
Development Technologies,  
Inc.  
803-790-9230  
71333.3362@com-  
puServe.com  
www.devtech.com

Development Technologies' DeskMan/2 is a suite of OS/2 productivity enhancement tools. Its components permit you to manage, customize, enhance, protect, and distribute your OS/2 desktop environment.

This is a *very* powerful package. It has many features and great flexibility. In fact, I was nearly overwhelmed with the options available.

## Configuration Images

DeskMan/2 saves and restores images of your entire Workplace Shell environment with its Configuration Image Facility. This can be done graphically using PMImage, or from the OS/2 command line with DM/2 Image. These do essentially the same thing, only with different interfaces.

What is a WPS image, and what is it good for? Your computer's environment consists of the files OS/2 uses to define your specific computer: the system files, all the objects, and the desktop structure, as well as any other files that you may specify.

If you have this information saved in a "repository," you can quickly restore your computer to the saved condition. Since you can have as many repositories as you wish, this lets you do more than recover your entire computer environment after a disaster. You can also reconfigure your system for a variety of different uses, such as training and demonstrations.

This loosely compares to Uni-maint's Desktop Backup and Restore, or the desktop archive which OS/2 Warp can do at each start-up.

That's the basics; now for a few of the many options. You can select a meaningful name for each repository, select the number of generations to keep of a given repository set—up to 99—and attach comments to a repository set to remind you what environment was archived.

## Object Manager

DeskMan/2's Object Manager archives and recreates desktop

objects, in the event that they are damaged, modified, or deleted. The archives can also be used to transport objects between computers.

Objects are saved in a special container class called archives. You can have any number of archives, located on a workstation or server, and containing any number of objects, from one to an entire desktop. These archives are similar in concept to Object Desktop's object packages. (In fact, I suspect that object packages were modeled after DeskMan/2's 1.0 Object Archives.) However, the similarity ends with the concept. DeskMan/2 provides exceptional flexibility and options with its Object Manager.

The Object Manager can be used manually, or set up to automatically archive each object in a folder when its parent is closed, or recreate objects when their parent folder is opened. Different archives can be designated for different objects, and can even be located on file servers. The Object Manager also allows you to transport saved objects to other machines and to other versions of OS/2. To manually recreate objects from an archive, open the archive folder and drag the object(s) to the desired location.

The Object Manager provides a boat-load of tools to help you find, select, and recreate objects. By right clicking on an object or folder in an archive you are presented with many options involving recreating all the objects in the folder, all sub folders, the parent folder; update, replace, or skip if exists, etc.

Additional functions can selectively remove the Lockup, Shutdown, Find, and Window list buttons from the LaunchPad, or delete "unshredable" objects such as the shredder itself, desktops, and templates.

## Workplace Shell Extensions

The DeskMan/2 Workplace Shell Extensions give you greater control of your desktop objects. I'll cover a few features, but I'm leaving out a lot.

*Provide each user with a personalized, access controlled desktop.* I created a desktop for my kids with games folders and a fun background which they like; it opens as the default. Another desktop is set up for my common tasks, with a different background. The different desktops can even be set up with password protected access. Creating additional desktops is simple and can be very useful, when it works. So far my system locks up occasionally when I switch between the desktops.

*Automatically close, hide, or minimize parent folders when objects are opened.* This is handy to keep the desktop from becoming cluttered while you drill down through several folders. I really like that you can select the action that activates this option. For example, the parent folder can minimize only if you open a child object with a double-click; opening it any other way will leave the parent folder open.

*Automatically reopen parent folders when objects are closed.* You can return to a parent folder when finished with a child folder or program.

*Remove selected items from folder, object, drive, and printer menus.* Suppose you don't want your kids or network users to have access to some of the functions on the pop-up menus: lock up, delete, move, etc. Simply remove those options from the menus. This can be done globally, or on selected objects.

*Remove network items from menus.* You can remove items such as: Start/Stop Sharing, Login/Logout, from the LAN Server/Peer menus or Warp Connect/Warp 4 menus.

*Make objects invisible.* I imagine that this would be useful for doing product demos. You could make all objects which are unnecessary for the demonstration invisible, leaving only the demo product objects visible. It might also be useful when making screen shots without showing how cluttered your desktop really is.

*Enable an info line in folders.* This places an information bar along the bottom of folder windows, displaying the number and collective size of



selected objects and objects in the folder. Unfortunately, the info bar is added to the inside of the window's current dimensions. This causes it to encroach on the space that the displayed objects occupy, evoking a vertical scroll bar in all my folders which I had previously sized just right for all the objects to fit. Once you enable this feature, you will have to resize every folder the first time you open them, if you want to avoid needing to use the scroll bar in each one.

*Adjust the window size, position, font, and closure behavior for OS/2 and DOS windowed sessions.* You can tell DOS/OS2 windowed/full-screen sessions to confirm or not confirm on close, or even not to close unless "exit" is typed in.

*Control access to individual objects and folders.* You can configure any or all objects to require a password to allow opening the object, opening its settings notebook, deleting the object, or dropping other objects on it. You can have multiple passwords and multiple levels of security. This can be a big help to a systems administrator—or a parent. "No, Caleb, I won't unlock the games folder until after you finish your homework."

*Record each user's selected Workplace Shell activity in an audit trail.* You can record when changes are made to an object's settings, or each time an object is opened. Use this to see which applications are being used most by your employees.

## Multiple virtual desktops

The VUEMan/2 Desktop Manager enables you to set up a collection of separate, independent desktop work environments (workspaces), each tailored the way you like. These environments can be switched between, leaving the windows in all the other workspaces unchanged.

Each separate workspace has its own OS/2 Window List, which only lists the windows in that workspace. You can add a command line interface to the bottom of the Window List to quickly and easily type in OS/2 commands. This command entry box also has a drop-down list box which can be used to quickly select previous OS/2 commands which were entered in this interface.

The drop-down list box can easily be emptied.

A script can be designated to run in association with each workspace. The script can be run at system startup, the first time the workspace is entered, every time the workspace is entered, or when leaving a workspace. For instance, if you set up a workspace your LAN communications, you could direct VUEMan/2 to execute a logon script the first time you switch to that workspace.

You can switch to a different workspace in three ways. I am a bit disappointed here; all are inconvenient. Each method involves selecting a menu, then an item on that menu, before you can move between the environments. I would like to see the selection process simplified by at least one step, perhaps by having a sub-menu on the desktop pop-up menu.

I am used to Object Desktop's virtual desktops: a graphical representation of several desktops which you choose with a single click. Interestingly enough, previous versions of DeskMan/2 implemented that same type of Virtual Desktop setup, but for some reason it was abandoned in this version.

## Miscellaneous goodies

*Object Explorer* is a tool for examining, displaying, and editing object attributes. When you drop an object onto the Object Explorer icon, an Object Setup window appears describing the object in detail, including its non-default settings. You can change them right there, in the Object setup window.

The *Black Hole* will destroy anything that is dropped on it, including things that the OS/2 shredder cannot get rid of, such as printers and desktops.

## Caution

After installing DeskMan/2 V3 the first time, my computer gave me fits. I finally concluded that this was the result of a conflict with Object Desktop 1.5. In order to get on with this review, I opted to reinstall Warp 4 without any FixPaks and without any other desktop enhancers (namely Object Desktop). When I installed DeskMan/2 on this "vanilla" system it worked just fine, with the exceptions noted above.

I installed FixPack 5 and found that it introduced no problems with DeskMan/2's operation. The nightmare began again when I reinstalled Object Desktop. I could not get them to peacefully co-exist, even after countless hours of fussing and configuring. The bottom line is that you'll probably have to choose between DeskMan/2 and Object Desktop.

## Strengths and weaknesses

DeskMan/2 has such a variety of features that, while it has something for everyone, it is doubtful that any one user would want to—or even be able to—actively use all of what this software has to offer. It is also unlikely that any two users would pick the same set of features as their favorites. A system administrator would find a whole different set of features to be valuable than would a SOHO or home user.

My opinion, as a kitchentop user, is that DeskMan/2's strengths are in the Configuration Images and Object Archives. It is hard to argue that you can ever have too many back-ups, and these two features provide great ways to back up your desktop and system files, all at once, or just the elements you want. Other things I like are: personalized desktops, being able to add certain items to the pop-up menus, and having an info line in my folders.

The access control is not the big security guard that I first thought it would be. Yes, it keeps careless or unauthorized people from rearranging your desktop or seeing objects that you have made invisible, but it doesn't really control file access. Even with strict access controls in place I could still launch programs by using my file manager program.

The installation program is top-notch. It provides a lot of information along the way to help you decide what parts to install and where to install them. It puts a folder on your desktop which contains the installed program objects. Depending on which parts you install, it may need to modify your Config.sys file; but when it does, it is very good about adding comments along with the lines it changes. ☺



# HTML Studio: best on any platform

by Bill Teags

This is not my first review of OS/2 software, but it has been probably the hardest to sit down and write! I've been enjoying the software I am supposed to be writing about too much to stop to write about it. HTML Studio v1.55 is probably one of the best all-around HTML authoring programs for *any* platform.

## Checking out the competition

To test my conclusion, I went over to "the other side" of my computer (Windows 95), and loaded and ran several programs acclaimed for their ease of use, simplicity, robustness, and graphic user interface. The list of competitors included HoTMetaL Pro 4, Hot Dog Express, Hot Dog Pro, and several shareware programs, none of which lasted long enough on my machine to earn a mention.

Suffice it to say that I quickly developed a long Franklin list of Cons and a short list of Pros while comparing these "name" products to HTML Studio. I guess that once you have been exposed to an OS that doesn't crash every 30 minutes, it really doesn't matter how pretty the interface or how in-depth the tag support is. Among the things I didn't like in the other programs were the lack of flexibility and that certain programs insisted on changing the layout of the code; the latter was especially a problem in HoT-MetaL Pro, where I kept mysteriously losing a <CENTER> tag. Flexibility is important if you want your Web page to look different from the crowd, or if you want to stretch out a little and try out JavaScript. I like that HTML Studio gives you a nice, flexible starting point for your Web page and then quickly moves you into a text based environment.

If you are a little intimidated by your first few tries at HTML coding, the second best software available is still written for OS/2. Home Page Publisher, Version 1.0 Level H offers a good starting point for the novice. It has some nice properties

not found in HTML Studio, such as a color wheel for figuring out your color choices. However, I found it to be a little awkward and limiting once I got the feel of HTML coding.

## A gentle start

Each time you start the program, a pop up menu displays a new tip; that's either interesting or annoying depending on how you feel. Personally, I like the tips, mostly because I hate reading manuals, so I usually miss the tips handed out along the way.

Creating a new HTML page is quite easy. Click on the New icon and up pops a "New Project" entry box. You put in the name of the document (such as "index.htm"), select the directory it will be placed into, then click Create. A pop up dialog asks you to name your document; this is the META TITLE your document will have. You can also specify the graphic to use for the background as well as colors for background, regular text, and link texts. Once you complete this box, your new HTML document is created; you are ready to begin adding text, graphics, links, tables, frames, and all the other goodies that will make your page a success.

Plenty of features set this software apart from a general text editor. All of them help you quickly get your page created, tested, and ready for public viewing. One of the best

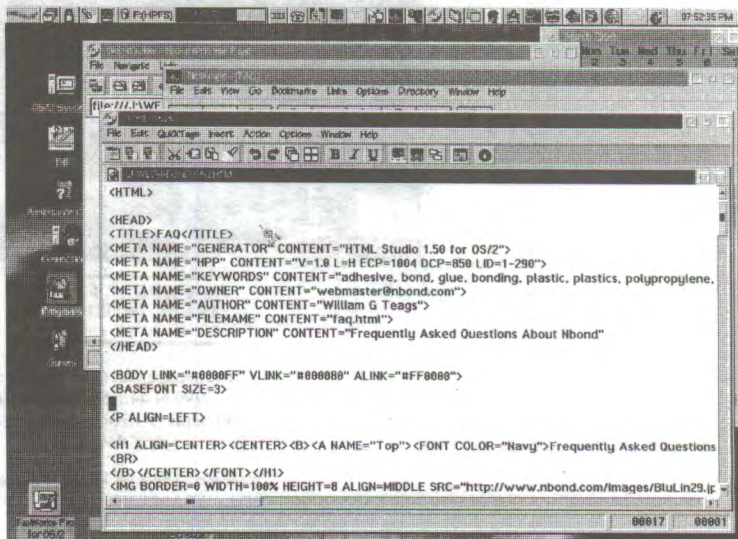
features is flexibility; you aren't limited to what HTML is doing today. Virtually anything you can put on your page can be created using this software. There's even built in capabilities to insert WebExplorer animation and special characters (ASCII characters like %, & and @) and Java applets.

I have grown to like the Quick-tag, a drop down menu item that lets you create HTML tags without having to type the tag. My only complaint is that the use of keyboard shortcuts is very limited, requiring you to continually switch back and forth from the mouse to the keyboard, or spend too much time "Alt-ing" through the menu.

Once you have content on your page, you can easily test your creation. HTML Studio has a nifty feature that lets you click on an icon to launch Netscape for OS/2 or the included Web Window. You get instant feedback on what your page will look like before you load it onto your Web server. One trick I used was to be on line to the Internet so I could test out the hyperlinks.

Next and Previous buttons move you to different pages that you may have open in HTML Studio. I found this a useful tool to do cut and paste operations on certain parts of my pages that were to remain constant.

You can see the results of my efforts using HTML Studio by checking out my website at





www.nbond.com. If you look at the View | Source of each page, you will notice that as the dates of creation become more current, the content looks cleaner. I've learned that, as you get more into being a good HTML codesmith, you tend to write better! Also, I started out by using Windows 95 software, so you can still see some of the sloppy code generated from "the other side."

### **Wish list items**

I'd like a quick reference in help to the HTML tags, plus a short description of what the tag does. With continually evolving standards, this could become quickly outdated. But it would still be useful, especially when you're touching up a page and have a "senior moment" where you

cannot remember the tag or its' attributes!

Other items I'd add to the wishlist are color coding the HTML tags, and a notifier informing you if you are including tags that will only work in the latest browsers. (Netscape and Internet Explorer have different ideas on how to implement the very latest tags, so if you want to build a "safe" page, you must be careful to use tags that have been around for a while. Otherwise, you'll need to incorporate workarounds into your pages, and continually test your pages on other platforms.)

The help menu is fairly complete, but it assumes that you are somewhat familiar with HTML coding. For the absolute beginner, it tends to talk a little over your head.

One of HTML Studio's hidden benefits is its stability. I have yet to have it hang or misbehave, even when I am purposely trying to bring the program to its knees. I wish Windows 95 users could experience this!

Unless you are truly comfortable writing code in a plain text editor, you should try HTML Studio. The features and ease of use are well balanced. I have yet to see any graphical page generator that truly builds a respectable web page, let alone a page that really stands out. You really need the ability to see and edit the code and this is where HTML Studio comfortably blends the needs of the user with the demands of code writing. ☺

## **Put Yourself in Our Place... And See What a Training Environment Should Be.**

Say good-bye to everyday hotel and meeting rooms and all the uncertainties that come with them. Say hello to Knowledge Development Center (KDC) and take a step up to the perfection you've always wanted and never had...until now.

KDC is Phoenix's only fully configured, permanent, rentable training facility. Each of our four rooms is also available for that special meeting when you need a memorable place to gather.

Call Walt Householder at 602-840-4750 and tell him you want to see what KDC can provide you. He would love to tell you all about it. For a tour, visit our WEB site at [www.kdc-phoenix.com](http://www.kdc-phoenix.com).



**KDC** KNOWLEDGE  
DEVELOPMENT  
CENTERS

Knowledge Development Center  
2999 N 44th St. Suite 400  
Phoenix, Arizona 85018-7246  
602-840-4750

Windows95 is a registered trademark of Microsoft Corp.



# random bits New and improved

compiled by Esther Schindler

When IBM first quietly tested built-in Internet access in OS/2 Warp 3, I never imagined that it would become so important. Perhaps it's because the Internet and online services are the major resources for OS/2 users—aside from *extended attributes*, of course—but an increasingly high percentage of OS/2 applications are related to the Internet.

Here's a sample of new applications released in the last month, or significant upgrades to existing products. These haven't yet been evaluated; if you're interested in writing a review (which means you get to keep the software!), contact [reviews@possi.org](mailto:reviews@possi.org).

## PMMail Archiver

PMMail Archiver archives messages, reindexes the message folders, and sorts PPMail address books. Files are archived into a standard zip file.

PM Mail Archiver is a command-line driven program, so it can be called from within PPMail as an external hook, usually upon exiting the program. It's available in Windows and OS/2 versions.

Registration: \$22.95. Available at BMT Micro.

## Bandit Tagger 2.0

Version 2 of Bandit Tagger incorporates seamless support for Netscape 2.02 for OS/2.

It enables you to insert random or manually selected tags into mail messages generated using Netscape.

Bandit Tagger supports:

- Internet Adventurer 1.01+
  - SouthSoft PPMail 1.91+ (1.95 doesn't work; use 1.95a)
  - SouthSoft PMINews 1.00+
  - Knight Software MR/2 Internet Cruiser Edition for OS/2 1.30a+
  - Innoval Post Road Mailer 2.00+
  - Netscape 2.02 for OS/2
- Further information is available at FA Partners, [www.gbar.dtu.dk/~c918704](http://www.gbar.dtu.dk/~c918704).

## QuickMotion 2.0

QuickMotion 2.0 with QuickTime Virtual Reality (QTVR) playback is a major upgrade to the award-winning

QuickMotion utility for playing QuickTime movies natively under OS/2 Warp.

With QuickMotion 2.0, you can view real-life objects captured in the interactive QTVR format—by far the most widely used VR format on the Web. You can also interact with single and multi-node panoramas, which are complete 360-degree views constructed from real photographs, 3D renderings, or any other source. Zoom in to discover more detail. Click on a hot spot to link to another location in the scene or to another Web site.

Virtual Reality content can be navigated inside Netscape using the QuickFlick plugin, or stored locally and brought up on your desktop using the QuickFlick stand-alone application.

QuickMotion is not just a clone of QTVR players for other platforms. It was designed just for OS/2. Many of these features are *only* available to OS/2 QuickMotion users, and not to users of the shipping Windows plugin:

- Grab and spin controllers are always available
  - Continuous zoom with right mouse button
  - Start navigating a multi-node panorama before it's finished downloading
  - All codecs supported
  - Hands-free operation with auto-spin at any speed
  - Fully accurate correction all the time (no cheating for speed)
  - Pentium-optimized renderer
  - Save frames in all popular formats
  - Quick copy frame for export
  - Precise rotation +/- 90/180
  - Keyboard commands don't require mouse to be over window
  - Movie windows are children of the desktop (no lame MDI interface)
  - Custom WPS class for QuickTime Movies means you can view QTVR with a double-click.
- QuickMotion 2.0 is currently available for on-line purchase. The full version is \$34.95. Registered users

of QuickMotion 1.x can upgrade for \$19.95.

To purchase, or download a demo, visit [www.quickmotion.com](http://www.quickmotion.com).

## Digital Camera utility

A new version of DCITU (Digital Camera Image Transfer Utility) for OS/2 allows images from various digital cameras to be downloaded via serial port.

The current set of supported digital cameras include models from:

- Kodak
- Agfa
- Epson
- Olympus
- Sanyo
- Sierra
- Toshiba

More information is available from <http://members.tripod.com/~dc210/index.html>.

## Virus Check Pro

Virus Check Pro is a unique front end for the most popular native OS/2 anti-virus tools. It supports:

- IBM AntiVirus
- Sophos Sweep
- McAfee VirusScan
- Norman Virus-Control
- Dr. Solomon's Anti-Virus Toolkit
- H&BEDV Antivir/2

Virus Check Pro allows you to scan file and folder objects just by drag and drop. Visit [www.hamburg.roses.de/~carsten.mueller](http://www.hamburg.roses.de/~carsten.mueller) for complete details.

Available at BMT Micro. Registration \$20.

## Java client for PM2YOU

Ridax released a Java client for its WIN2You and PM2You remote control products for Windows 95/NT and OS/2. You can remote control the desktops of Windows 95/NT or OS/2 machines over the Internet or other TCP/IP networks. Any computer running the WIN2You or PM2You remote control host product can be reached from an ordinary Web browser with Java 1.1 support, including Netscape Communicator 4, Microsoft Inter-



net Explorer 4, or Netscape 2.02 for OS/2.

The new client isn't limited to OS/2 and Windows platforms. It can also be used to take control over Windows 95/NT or OS/2 machines from Unix, Macintosh, or NC environments. The WIN2You and PM2You hosts have built in Web server functionality, so there's no need for any external Web server to connect to the hosts from the browser.

Using Java Applet distribution technology, the Java client software is automatically downloaded from the host's built-in Web server and started when you connect to the host. This technology ensures that you are always using the correct version of the client software, eliminating the need to install any updates at the client machines.

Of course, the WIN2You and PM2You remote control hosts can also be accessed over dial-up serial connections and network connections such as NetBIOS or named pipes. Client software is available for Windows and OS/2.

Free demonstration versions of the WIN2You and PM2You remote control host products and the Java client are available for download at [www.aditom.se/ridax](http://www.aditom.se/ridax).

### NetREXX 1.130

NetRexx v1.130 is available. IBM's NetREXX is a human-oriented programming language which makes writing and using Java classes quicker and easier than writing in Java.

Changes since the last version:

- The new copyIndexed method on the REXX class allows the sub-values (indexed strings) of one REXX object to be merged into the sub-value collection of another REXX object (available in runtime since NetRexx 1.120).
- The '\$' character is now permitted in variable and other names.
- It is now an error to attempt to use a concatenate operator on an array (unless the array is of type char[]).
- The methods generated for indirect properties are no longer inhibited by methods of the same name in superclasses.

○ The NetRexx Supplement has been updated to document changes since August 1997.

For more information, see [www2.hursley.ibm.com/netrex/](http://www2.hursley.ibm.com/netrex/)

### Prominare Designer 5c

Prominare Designer Release 5c is now available from Prominare Inc. through the company's Web site [www.prominare.com](http://www.prominare.com) for \$179. Current owners of Prominare Designer Release 5a and Release 5b can upgrade to Release 5c for free.

Release 5c is a maintenance release with enhancements for Unicode and porting to Windows NT.

Prominare Designer is a programmers tool for the creation of fully featured GUIs for OS/2 and Windows NT/95. Acting as an extended resource editor, Prominare Designer supports all OS/2 controls for all versions of OS/2 including Warp Version 4.0. Its inherent flexibility enables the power of C to be fully exploited, with the added benefits of intelligent code generation.

Prominare Designer offers the best of prototyping and programming tools. Prominare Designer enables programmers to quickly create applications which conform to an individual company's:

- programming standards
- coding conventions
- selected level of CUA compliance

The linkage to the resource editor allows Prominare Designer to offer uniquely excellent facilities in the areas of custom controls, facilities which are lacking in other tools.

The programmer can use one interface to create both the resources and code for OS/2 PM and Windows NT/95 applications. The resource editor is backwardly compatible with all versions of OS/2 and Windows NT/95.

Prominare Designer speeds the process by which interfaces are completed by removing unnecessary generation phases. When the system is modified, Prominare Designer regenerates only the parts that have been modified since the last generation operation was carried out.

Prominare Designer's inherent intelligence enables the programmer

to change the look and feel of the interface without having to reprogram the actions of individual controls. When code is regenerated, Prominare Designer scans the existing code. If manual programming changes have been made, the changes are immediately inserted, unchanged, in the updated code.

Prominare Designer provides total flexibility in the code generated. Its code structures, can be modified by the programmer to ensure that the generated code conforms with company naming conventions and coding standards—a capability that is essential for major companies developing GUIs. This also speeds the process of programming as the code generated is in a form that the programmer already understands.

Further details can be found at [www.prominare.com](http://www.prominare.com) or by sending email to [designer@prominare.com](mailto:designer@prominare.com). Or you can email the lead architect of Prominare Designer at [msmith@prominare.com](mailto:msmith@prominare.com).

### CodeQuill

CodeQuill is a text editor which features a Java implementation, vi keyboard personality and syntax expansion.

As a Java based editor, CodeQuill offers the advantage of working on multiple platforms without requiring multiple copies. In its initial release, CodeQuill emulates the vi keyboard. Users of vi will find the CodeQuill keyboard a familiar tool. CodeQuill also offers user definable syntax expansion. This feature saves keystrokes by expanding keywords into nested constructs. CodeQuill is designed to be a direct, efficient, coding tool.

Registration: \$29. Available at BMT Micro. ☺



Julian Thomas is a retired IBM engineer and programmer who uses OS/2 for almost everything; he, his wife Mary Jane, and Matinicus, a red Maine Coon cat, now live in the beautiful Finger Lakes Wine Country of New York State.

I haven't used the Dial Other Internet Providers (DOIP) icon for more than two years. Long ago, someone at my ISP who speaks OS/2 gave me a script to invoke PPP.EXE directly with a login script to send the password. That worked fine, but when the reviews editor solicited suggestions about Internet software to review in this issue, I suggested InJoy—and I volunteered to write about it.

InJoy is a shareware dialer that replaces the DOIP provided with OS/2 Warp without using the underlying PPP.EXE.

I was interested to learn how well InJoy worked. For one thing, I was in the process of setting up a home LAN; InJoy's IP Masquerading facility seemed to promise that Mary Jane could browse the Web on her machine at the same time I was online (and it does!). So I installed the program and changed my Internet object to select a new REXX program to invoke InJoy.

## Getting started

Installation went smoothly, and then it was time to configure the dialer. You need about the same information that you enter into the DOIP notebook (Userid, password, choice of SLIP or PPP, etc.). You can then invoke a "learn mode" to create a script by capturing the dialog of a manual login to your service; once this has been done, InJoy will connect with no intervention required.

Setup has a few rough edges. The program runs in an OS/2 text window, and some of the fields (phone number, for instance) need to be scrolled horizontally to show the entire contents. InJoy is mouse aware; clicking on a box initiates the indicated action, or you can tab to highlight a box or action and then press enter or key in the needed data.

The "learn mode" is just that. Once the connection is established, it is not usable; you need to disconnect and then reconnect with the script enabled—and you may need

to edit the script. I set it to redial on busy, but this did not work; investigation led to the default modem initialization string not calling for the mode that detects the busy signal. Once I resolved this problem, I found the ability to automatically "attack dial" was quite useful.

Once you connect (which is indicated by a distinctive tune), the display is quite informative, showing line usage statistics and other information. You can disconnect by getting focus in the InJoy window and just hitting Esc, or by invoking an included program called Killjoy.

Documentation and support is excellent. A short README.DOC; a full USERGUID.DOC, and a FAQ.TXT can educate you about the software. In addition, at the web site ([www.fx.dk/injoy](http://www.fx.dk/injoy)) and in the mailing list, the author is quick to respond to questions and problems.

## Loaded with features

InJoy is loaded with features and options. An "autostart" mechanism allows you to specify programs to be started/stopped on various events (InJoy startup and exit; before dialing; host connect and disconnect). Unfortunately, this didn't meet my key requirements:

- There's no provision to START a program on exit from InJoy.
- Starting a program before dialing didn't allow enough time for the program to complete before InJoy tried to capture the COM port.

These limitations made it difficult (well, impossible) to use the facility for the FXRCV.EXE utility that's part of the registered version of FaxWorks. A query on the list brought forth suggestions to wrap the FXRCV call in a REXX command with a sleep command, or to upgrade FaxWorks, but there's no other motivation for me to do this. I solved the problem by reverting to my old technique of wrapping the InJoy call in a CMD file that included the FXRCV calls before and after InJoy.

A "Dial on Demand" capability essentially allows you to start up your mailer or browser, and have InJoy dial up when required, disconnecting when your Internet session is completed.

In spite of the criticism, I'm quite enthusiastic about the program. Only a few days before I finished this review, I finally succeeded in getting the home LAN working. Exploiting the IP Masquerading feature was very easy indeed, following a step by step procedure outlined in FAQ.TXT.

At this point, it's worth noting that there are registration levels for InJoy:

- Basic: \$20. Does not include IP Masquerading or Dial on Demand
  - Extended: \$35. The one for "most of us," this registration level includes the features left out of the basic version, and a number of additional features including lifetime upgrades.
  - Pro: \$150. Includes PPP and SLIP servers (currently in beta).
- Bottom line: InJoy is highly recommended in spite of a few rough edges here and there; it has excellent support via the mailing list. ☺



# BackTalk 2.0

by Julian Thomas

The *New and Improved* column (February 1998) mentioned BackTalk, a free OS/2 speech system, and summarized its capabilities quite nicely. I have been exercising the application on my system in the past few weeks, and wanted to offer a few comments.

First of all, here are some corrections to the original article:

○ The URLs have changed. Find BackTalk at:

[www.cam.org/~guardia/archives/btalk201.zip](http://www.cam.org/~guardia/archives/btalk201.zip)

○ And for the dictionary: [www.iglou.com/DeckerAutomation/products.html/CMUDict.zip](http://www.iglou.com/DeckerAutomation/products.html/CMUDict.zip)

## About speech synthesis

I've been observing the speech synthesis scene since I was in graduate school and heard a delightful gentleman from the British Post Office demonstrate "Pat," a relay rack full of electronics. Text to speech was still a dream for the future. Pat's input was a glass slide that was scanned to generate the speech; only a few phrases had been encoded, the most frequently demonstrated being "What did you say before that?"

Fast forward a number of years to the '60s, when IBM had monster devices (one of them was known as "Chatty Cathy") that attached to 360 mainframes and telephone lines, and "spoke" from a very limited repertoire. But these devices used prerecorded analog voice, as many systems still do today, although the recordings are most likely now digitized like WAV files.

More recently, we have all heard hardware speech synthesizers speaking in a very mechanical voice; even my answering machine does this to tell me how many messages are waiting. Finally, with the advent of inexpensive sound cards, we have arrived at affordable software approaches.

## The price is right

As freeware, BackTalk 2.0 certainly qualifies as affordable. The speech engine provided with BackTalk is

not terribly understandable (Mary Jane thinks I'm being charitable with this statement); but the author has done a superb job of creating the Rexx functions and environment that make it easy to use and to integrate into your applications. Functions (each with a corresponding object which is created in a BackTalk object, also created) include:

- Speaking Clock
- Speaking Timer
- SpeakMail: called from an email filter in MR/2 ICE (or other mailer), will announce subject and sender
- SpeakIRC
- SpeakText and SpeakFile

The ones I tested worked more or less as advertised. I did have to modify the "Say File" object to prompt for a filename, and I modified speakmail.cmd to use the MR/2 ICE environment variables rather than extracting "From:" and "Subject:" from the message. There were a couple of minor glitches in the install process (it was unable to properly create a couple of objects;

no big deal). And it speaks our favorite operating system as "OSS SLASH 2."

The author also has posted to several lists that he is exploring interest in another engine that would not be free; he is soliciting expressions of interest from those willing to pay \$20 for the improved version. On the basis of a 9 MB demo version of the engine ([ftp://ftp.eian.fr/Demonstration/OS\\_2/read\\_me.htm](ftp://ftp.eian.fr/Demonstration/OS_2/read_me.htm)) which is considerably better (although hardly perfect), I immediately signed up for his list. He can be reached at Samuel Audet <[guardia@CAM.ORG](mailto:guardia@CAM.ORG)>. ☺

Julian Thomas is a retired IBM engineer and programmer who uses OS/2 for almost everything; he, his wife Mary Jane, and Matinicus (a red Maine Coon cat) now live in the beautiful Finger Lakes Wine Country of New York State.

## OS/2oons

by Harry Martin

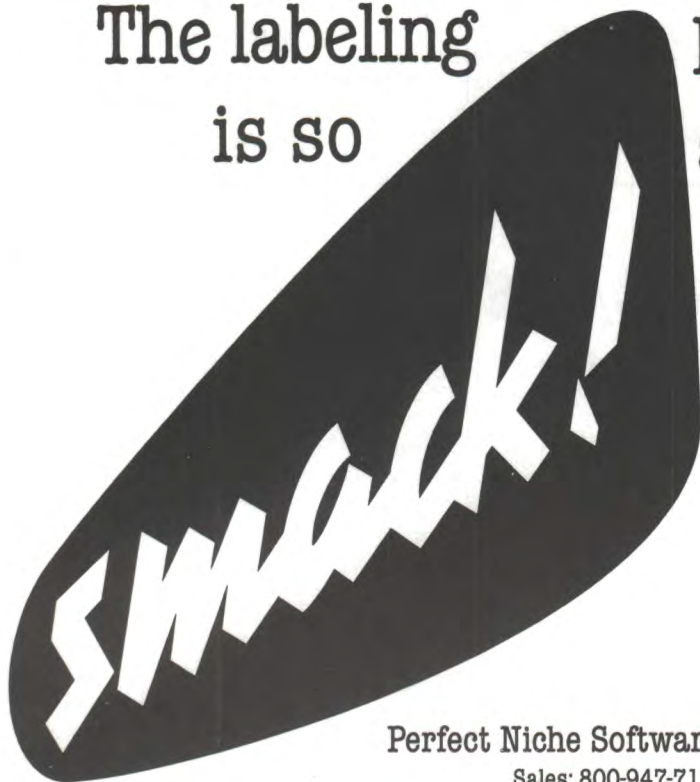


"Well... So much for trying Windows 95 on the navigation computer!"



The labeling  
is so

program for OS/2  
good...



Let's just say it comes with an  
absolutely unconditional 90 day  
money back guarantee.

Perfect Niche Software, Inc. 6962 E. 1st Ave. #103, Scottsdale, AZ 85251  
Sales: 800-947-7155 Fax: 602-949-1707 Email: sales@perfectniche.com

## THE OS/2 SUPERSITE

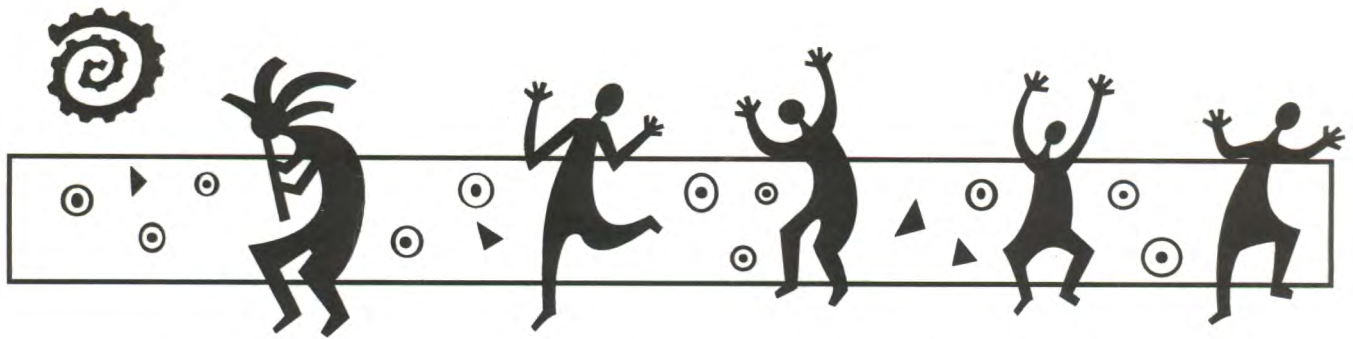
<http://www.os2ss.com>

- Over 2 gigabytes of OS/2 shareware and freeware
- Mailing lists such as OS2USER and WarpCast
- Home of several popular OS/2 web sites such as OS/2 e-Zine!, EDM/2, OS/2 Connect, Loren Bandiera's OS/2 News and Rumors Page, and Timur Tabi's New OS/2 User page.
- The OS/2 Discussion Forum
- Online shareware registration and commercial software purchasing

### Join the Supersite Members Club

Club members get special deals on commercial software and \$2.50 off every shareware application they register through BMT Micro. Members also get FTP access to the Supersite archive and space for their personal web page. See <http://www.os2ss.com/club/> for details.





## The Phoenix OS/2 Society, Inc

The Phoenix OS/2 Society is a computer user group dedicated to OS/2. We have been publishing our award-winning magazine, *extended attributes* since August of 1994, and we have members all over the world.

Yes, this is a user group publication, and that sometimes shows; however, that's also an advantage, since you get real-world feedback about OS/2 and OS/2 products from other users, not just jaded, cynical journalists.

How useful will it be to join the Phoenix OS/2 Society if you aren't in Arizona? We see the Phoenix OS/2 Society as something akin to the National Geographic Society or the Smithsonian; while most members only see a magazine, you're actually a member of a society, and can participate in its activities when you happen to be in the area.

Even without activities that take place in Phoenix, Society membership includes product discounts that alone could make membership worthwhile. Taking advantage of one such discount could easily save you the entire cost of membership, giving you a "free" subscription.

Plus, the Society is prominent in the computing community. We are *already* heard by IBM; they listen to what we say. Several IBM executives get *extended attributes*. They don't get it for the "club news"—they use it to learn what OS/2 users really care about. And they respond to what they read.

You're not just getting a magazine. You're getting a voice.

If you would like to continue to receive the magazine, fill out the membership card in the center



## Invites you to join

Phoenix OS/2 Society, Inc  
5515 N 7th St, Ste 5-133  
Phoenix, AZ 85014-2585

Phoenix  
**OS/2**  
Society

